Clinical Lectures ON SCLERODERMA.

By H. RADCLIFFE CROCKER, M.D., M.R.C.P.,
PHYSICIAN TO THE SKIN DEPARTMENT OF UNIVERSITY COLLEGE HOSPITAL, PHYSICIAN TO THE EAST LONDON HOSPITAL FOR CHILDREN.

LECTURE I.

DIFFUSE SYMMETRICAL SCLERODERMA.

(Concluded from p. 138.)

BEFORE I comment on the case already described, I will relate the history of the other, and show how she has altered since she first came under our notice.

Priscilla F——, a widow aged thirty-eight, was admitted under Dr. Tilbury Fox on May 19th, 1876, when I was the assistant to the skin department, so that she has been under my observation the whole time. Her father died of pneumonia. Her mother accompanies her to-day, and is quite healthy. She has been married ten years, and has had six pregnancies, but each one aborted at about the sixth month; there is no other evidence of syphilis. The husband was a circus man, and she travelled with him, leading a very hard life, which broke down her health. Three years before admission she got wet, and sat in her wet clothes in the circus. The next morning she had pains all over her body, especially in the joints, which were swollen, the knuckles, wrists, and ankles being specially affected. The joints were so stiff that she could not bend them without difficulty. Soon she experienced a sense of tightness of skin across the chest, which extended to the collar-bones and up the neck to the mouth, and the skin "felt like a cord" from the chest to the chin. The fingers became drawn down into the hand, much more than they are now, and pressure, continued for some time, produced pitting of the hands. The feeling of tightness of the skin gradually spread up the arms and over the face, and wasting set in; the legs became affected also, but less than the arms, and there was a feeling of tightness at the knees when she stooped, but the legs have not wasted very much. Pains, generally of a gnawing character, and sometimes pricking, were experienced, and are still felt at times. For about a year previous to admission there has been no change in the condition of the skin; for the last two years she has been subject to fainting attacks occasionally, but lately they have been more frequent and severe. She is often giddy, and has had occasional attacks of numbness in the lips and left side of the face, and also in the right leg, but only of a few minutes' duration. Condition on admission: The face is much wasted, there are no wrinkles or folds, and the skin is tightly stretched over the bones; but on the forehead with great difficulty the skin can be slightly pinched up. The lips are shrunken and tightly stretched over the teeth, and the incisors are loose and appear to be falling out, but the gums are not very hard now. The venous radicles are dilated and mottle the otherwise extremely pale surface. There is general desquamation of the epidermis in fine scales, and scattered papules appear from time to time, which ultimately leave only a patch of scales in their place. On the chest the skin is tight and parchment-like as far as the third rib, and in a lesser degree down to the level of the ensiform cartilage; below this the skin is normal. At the back the disease extends over the scapula, but is less marked at the supra-spinous fossa, and ceases between the shoulders. The hardness is most marked in the arms, where the skin is much thickened, but the muscles and fat are extremely wasted. There is an increase of pigment in the axillæ and the upper third of the area on the inner side. The right arm is flexed to a right angle at the elbow; the bony prominences are very conspicuous through the stretched skin, and ulcerated in two places from being knocked. The right hand is extremely atrophied, the skin quite smooth and shiny, and the fingers semi-flexed in a claw-like manner, the little one being nearly flexed on to the palm, though there is slight power of movement in the metacarpo-phalangeal joint, but none in the other joints. The wrist is ankylosed, but she has slight power of rotation from the head of the radius being partially free; the distal phalanx of the thumb is drawn back by the contracted extensor, but the other is straight. The front of the thigh is in the same condition as the arms, though less developed. The urine was 1012, with no albumen or sugar. The heart had no thrill, but there was a systolic and a presystolic murmur at the apex, both conducted towards the axillæ, and reduplication of the second sound at the base. Such was her condition in 1876. She was treated with iron and other tonics and cod-liver oil, and diligent friction with simple ointments. Under this treatment gradual improvement took place, and she has now recovered as far as the severely damaged tissues would admit. Her face, as you see, is still thin and expressionless, for not only the fat but the muscular tissue was atrophied. The skin is now easily pinched up and freely movable, but it is still pale, except where mottled by telangiectic vessels, which are very abundant. The upper lip is shortened still, but all the front teeth have dropped out, so that the shortening is less noticeable than before. The arms are much wasted, but the stiffness and hardness of the skin have disappeared and the wrist has recovered its mobility. The hands, however, are hopelessly crippled, for though the skin is movable, and perhaps there is a little more movement at the metacarpo-phalangeal joint, it is not of any material use, as the rest of the finger-joint is as completely flexed as ever. If you compare her hands with the preceding case you will see how exactly one is the counterpart of the other, with the exception that the wasting and flexion are somewhat greater in this patient. This is the condition that Ball described as "sclerodactylie," though another name is scarcely needed for a single phase of this disease. Deep as is the abyss into which such patients as we see before us are plunged, there appears to be a lower depth still. After a time in these patients the disease comes to a standstill, and though they generally lose flesh, at least their life is not in danger, unless from an intercurrent malady which they are less able to resist than they were before. In the other cases to which I allude the disease is progressive, with long periods of rest, it is true, but steadily downwards. Such a course is fortunately very rare, and I will merely quote in abstract one of Sir Erasmus Wilson's cases to illustrate it. The patient, aged fifty-seven, was secretary to a society, when the disease began, in 1866, with repeated attacks of swelling of the hands. Some months later the hardness and contraction made themselves sensible, and he experienced pain in the joints and tightening of the skin; then the front of the chest and neck became affected, and a little later the shoulders and arms; there was also a slight impediment in swallowing. In 1869, when Wilson saw him first, his hands, face, breast, and right foot were affected with atrophic scleroderma, and he was very feeble; voice, back, and knees, weak. In 1873 the disease had progressed and he was rather worse in every way, and deglutition was more difficult. In 1876 the left foot was attacked, like the right. In 1875 he died; it is not stated in what way. The condition had thus lasted nine years, with gradual progression and undermining of the general health.

Let us now compare our last two cases with each other, and then with the first two. In both the disease began with articular pains, but in the last it is clear that there was acute rheumatism present. In this patient there is a definite history of exposure to wet and cold immediately preceding the scleroderma, but in Jane E——, though probable, it cannot be definitely established. This association of acute rheumatism and heart disease with scleroderma is not an infrequent occurrence, and you will remember that this was the case in the child whose history I briefly related; but, as is so common in children, the brunt of the disease fell on the heart, the articular manifestations being slight. What is, then, the relation of acute rheumatism to scleroderma?—is it etiological? I scarcely think so. While there are, on the one hand, only a moderate proportion of scleroderma patients in whom the two diseases are associated, there are many scleroderma cases in which there has been no antecedent or associated rheumatic fever, while scleroderma would not be so rare if so common a disease as rheumatic fever was of direct etiological importance. I regard them, and also ordinary articular rheumatism which frequently accompanies scleroderma, as being due to a common cause—viz., exposure to cold, which is one of the most frequent and important causes of scleroderma. No doubt persons who have suffered from rheumatism are abnormally sensitive to cold and wet, and the same is true of people liable to erysipelas, and in this way rheumatism and erysipelas may

predispose to scleroderma among other things. With regard to the frequent association of valvular cardiac disease with scleroderma, it is more reasonable to consider it the direct outcome of rheumatism than to assume that it is due to a sclerosis of the valves analogous to the affection of the skin, though the possibility of such an origin cannot be denied.

To return to our last two patients. Both of them show their disease in the atrophic form, contrasting thus with the first two patients, though, as I have said, they do not represent anatomically but clinically opposite conditions. In this contracted condition the disease attacks the surface of the skin, the papillary layer, and epidermis, as well as the deeper part of the corium, and the subcutaneous tissues, which are alone attacked in the other form. The result is that the disease is much more obvious to the eye. The ivory-white colour which characterises nearly the whole of the skin of the affected area of Jane E——, unlike the white patch in Jane R——'s thorax, marks no mere deficiency of the pigment, but indicates a profound alteration of an atrophic character in the elements of the skin, due to defective nutrition. Great as that change is it is not irretrievable, except where there is complete destruction of elements, as we may see in the case of Priscilla F——. We shall consider this condition of skin again when discussing the other forms of scleroderma, as in them it is more invariably present. Both these patients have the deformity of the hands and forearms the same in every particular except degree, and in Jane E——you will remember the upper and lower extremities were affected in precisely corresponding areas. Owing to the alteration of colour we can determine more easily the line of demarcation in this form, which, as we have seen, is rarely possible in the other. The symmetry is as exact here as in the other cases, both as regards the parts affected and the parts exempt, as in the small free areas in the knee- and elbow-joints, which allowed free motion of those joints; but all patients are not so fortunate, frequently the tissue round the tendon of the biceps is infiltrated and forms a thick band of hard tissue traversing the front of the joints like a cord, and firmly fixing the joint in a more or less flexed position. In both these patients there was some increase of pigmentation in parts, but this was insignificant compared to what occurs in some cases, as, for instance, in Jane R——. Interesting in this relation is Dr. John Harley's case, in the Medical and Chirurgical Transactions, vol. xli., where there is a plate of the skin in the clavicular region, showing a network of dilated vessels like those of Priscilla F——, but more regularly retiform, and between the vessels streaks of light-brown pigment, though the most extreme instance of pigmentation in connexion with this disease is recorded by Mr. Gaskoin in the fiftieth volume of those Transactions. In many respects this is a most interesting case. At present I will only refer to the pigmentation. The patient, who was a brunette, "became very dark, especially below the waist, and in the extremities. In depth of colour the skin resembled that of a negress, or one of the darkest races, but the staining was otherwise than uniform. In the darkest parts there were yet darker portions interposed. Thus, in spite of glossiness of surface, the aspect was singularly disagreeable, and the well-washed integument was always spoken of by her as being dirty. The locality of the joints was clearly indicated by an increased depth of tint; the neighbourhood of the coxal articulation was shown externally by a huge black stain. In the course of the limbs there were superadditions to and renewals of colour, in the form of markings and blots; there were smudges and alterations in the tints, as of brown and yellow ochre, side by side, crowded together, and but slightly blended. The skin was thus varied and unequal, and though the ensemble is very black, it is broken with dingy shades of red, purple, or green."

This is doubtless an extreme case, but it may emphasise to your minds the fact that more or less pigmentation is usually present. Another point in Jane E—— is of some interest. In the subcutaneous tissues of the nape of the neck were some firm tubercles, the remanet of a large number which had formerly existed in the same region. In two other instances these tubercles have been noticed in the case of Mr. Gaskoin just alluded to, and in one of Mr. Hutchinson, a boy of ten years old, where they were in large numbers in the superficial fascia and the periosteum of the superficial bones, especially over the scapulæ, the spines of the vertebræ, the cartilages of the ribs, the crests of the iliac bones, &c. It appears to me probable that these tubercles are of the same nature as the "rheumatic nodules" described by Drs. Barlow and Warner, and commonly found in association with cardiac disease and rheumatism; they occur in similar situations and tend to disappear spontaneously. In Mr. Gaskoin's case some disappeared in a month, some took much longer; probably, if looked for, they would be found much more frequently than appears now to be the case, as they produce no inconvenience and are rarely conspicuous.

We now come to the most interesting consideration. What is the relation of this atrophic form to the hypertrophic form? Is it a later phase, only that the new tissue has shrunken and produced this condition? This is the usually accepted explanation, and the minute anatomy of such cases as have been examined lend some support to this theory. There has been found a great increase in the connective-tissue bundles, and of the elastic fibres, with diminution of the subcutaneous tissue bundles and fat lobules; and in these contracted cases the skin is directly adherent to the fascia or periosteum. There is narrowing of the vessels, in Schwimmer's case, examined by Babes, from concentric hypertrophy of the media and intima, but the commonest cause seems to be the infiltration of lymphoid cells round the vessels, which lie in the lymph channels, and form a sheath of varying thickness which presses upon the vessel, and this pressure is added to by the contraction of the increased connective-tissue bundles. There is increased pigment in the rete and corium, ectasia of the sweat glands, at first, and ultimately destruction of them, and of the hair and sebaceous follicles. Doubtless the contraction of all this new connective tissue would be calculated to produce the condition we observe in the atrophic stage, and in some cases this probably plays an important part, but it can scarcely account for such cases as that of Jane E——, and for most of the atrophic cases on record, in which the contraction appears to follow too quickly for it to be due to the contraction of newly developed connective tissue. The disease commenced, you remember, with œdema, or, as she called it, "dropsy," limited to the extremities, and the present condition gradually supervened, and was fully developed in less than six months. In the other case the early history is not very clear as to how soon the wasting set in, but there was pitting on pressure at first. In a case of Erasmus Wilson, after great mental anxiety, the skin became dark and swollen, and in a short time contracted; that the swelling was œdema we learn from the condition of the hands and feet, which some months later were swollen. The patient had perfect command of their movements at first, but later they stiffened, and were contracted.

Clearly, then, these cases differ somewhat from the first set, in which there was no pitting, though the difference is one of degree, not of kind; for it is not simple œdema, the pitting being, as Wilson put it, more like that produced by pressing on a skin of lard than on mere dropsical tissue. What, then, is the factor which determines whether atrophy shall set in early or late, or be absent altogether? Mere blocking of the lymph channels will not account for the symptoms, for, as Kaposi justly remarks, we should expect with this the condition of elephantiasis arabum; but there is this difference—in elephantiasis arabum, the trunk afferent vessels are, for the most part, free, while large numbers of the afferent vessels, both venous and lymphatic, are blocked. The result is œdema and overgrowth. In scleroderma large numbers of the terminal afferent vessels are more or less obstructed; and though, no doubt, many veins and lymphatics are obstructed too, the amount of nutrition brought is so much diminished that atrophy, not hypertrophy, results; while in cases such as our first two, occlusion affects a smaller number of afferent vessels, or is less complete, and distension of the tissues results. In short, in my opinion, the condition is one of ischæmia affecting the terminal arterioles, on the one hand, and venous and lymphatic blocking on the other, and according to whether the arterial obstruction is relatively great or small, atrophy or hyperplasia results. This view is, I think, in accordance with the acknowledged anatomical facts, and it will explain how the atrophic stage may be reached with antecedent œdema, but without the conspicuous intervention of the extreme lymph infiltration which characterises the hypertrophic condition; still, it leaves unexplained what was the origin of the process. Hutchinson, Kaposi, Schwimmer, and others seek this in the nervous system. Kaposi and Schwimmer regard it as a central trophoneurosis, and this is probably true to a certain extent for these diffuse symmetrical cases; while for the unilateral cases, especially those which show a distinct nerve distri-

bution, a more local neurosis would accord better with the clinical facts; but even now we have only gone one step further back, for while the nervous system may start a morbid process, and may have influence in localising its cutaneous manifestations, some other factor is necessary to determine the kind of disease that shall ensue. What that other factor is we do not know; probably the idiosyncrasy of the patient, whether congenital or acquired, is one of the most potent influences. In this case our French *confrères*, from its relation to rheumatism, would probably consider that the arthritic disposition was the factor sought for; but, as I have already shown, this is not a satisfactory explanation, for it has already been made responsible for so many varieties of skin eruption that it leaves us much in the same position as before.

There is another point in these cases to which I must allude. Of the four cases before you, three are females and one a male. As it happens, this is the proportion in which, taking a large number of cases, the disease affects the different sexes, and the coincidence will perhaps impress it upon your minds.

Such then, gentlemen, are the history and explanation, as far as I can afford it, of this mysterious disease, which, attacking people in the prime of life who were often previously in good health, too frequently leaves them hopeless cripples and blights their whole future existence. Is there, then, nothing to be done for these unfortunate patients? Yes, something may, though it falls far short of what we should wish. For the hypertrophic cases there is always hope that improvement may occur before new fibrous tissue is completely formed and undergoes its subsequent contraction. The first two cases show that nature itself does much; but we may assist her, not so much directly as indirectly. Good food and protection from changes of temperature are imperative; ferruginous and other tonics, with cod-liver oil, are distinctly beneficial in most cases, and shampooing after Turkish baths, or friction with oily substances appear to be important adjuncts; while some attach importance to galvanisation of the sympathetic. Although it is difficult to appraise the value of these measures in a disease capable of spontaneous improvement, yet as a whole I believe them to be useful, and they are certainly grateful and encouraging to the patient to whom a "do-nothing" treatment is profoundly disheartening. For the atrophic cases the outlook is decidedly gloomy, too often by this time irremediable crippling has resulted before the patient is seen. Priscilla F——'s case should encourage us to strive to give relief, though a cure is hopeless, for she had had the disease three years without improvement, when she first came under observation, and now has regained many of the lost movements, and all induration has disappeared. The same line of treatment was pursued as that indicated above, except that she had only the frictions and tonics without either Turkish baths or galvanism. The last agent is much advocated by some observers, but I have not tried it in these cases; for Jane R—— was so evidently improving spontaneously that it would have only been misleading to have used such an agent, while Jane E—— had been treated by galvanism for twelve months before she came here, without benefit. The best proof we can get of the efficacy of any line of treatment is when, after the disease has been quite stationary for some time, improvement ensues on the adoption of a certain measure. This is the case already with Jane E——; so that I think we may fairly credit the means employed with a good share in her improvement. The use of Turkish baths can afford another test of improvement—namely, in the resumption of the secretion of sweat, which is in abeyance when the disease exists in a high degree. Jane R——, for instance, observed spontaneously that sweating had returned in her hands in one of the baths, after being absent for several months. I think, therefore, there is fair ground for assuming that these therapeutic measures do really influence the disease for good, probably by improving the impeded circulation. Of course, arsenic, iodide of potassium, and mercury have been administered over and over again, but there is no evidence that they have been of any benefit; and mercury appears to have been distinctly injurious.

AT the recent annual meeting of the supporters of the Windsor Dispensary and Infirmary a very favourable report was presented, showing a balance in hand. During the past year a new women's ward has been erected, and increased facilities for dealing with accident cases provided.

ABSTRACT OF

Lettsomian Lectures

ON

DISORDERS OF DIGESTION,

THEIR CONSEQUENCES AND TREATMENT.

Delivered at the Medical Society of London on Monday, February 2nd, 1885,

BY T. LAUDER BRUNTON, M.D., F.R.C.P.,

ASSISTANT-PHYSICIAN TO ST. BARTHOLOMEW'S HOSPITAL.

LECTURE III.

WITH regard to the treatment of disturbances in the digestive function, the first step towards restoring it to health is to remove, if possible, the disturbing causes. Imperfect mastication is one of the commonest causes of disordered digestion. Man is a low-pressure engine, and works almost all his organs considerably under their full power. A healthy stomach can usually digest a good deal more than it is commonly called upon to do. There is, however, a limit to all things, and that limit is more easily reached in some cases than in others. The reserve powers of any function gradually diminish as age increases. If the mind be excited in any way, the movements of mastication are apt to sympathise with the mental excitement. It is evident that, during meals, all ideas of action to be taken by the individual himself should be banished from the mind. Reading anything which interests strongly should not be done during meal-time; and solitary meals are as a rule to be avoided, for the presence of a companion serves to maintain the nervous activity to which reference was made in the first lecture as an important factor in perfect digestion. The condition of the teeth is another cause of imperfect mastication. No teeth at all is far better than a few teeth; an absolutely toothless old man may masticate and enjoy even hard toast, and here the gums may be like the mandibles of a turtle. The nature of the food plays a considerable part in the process of perfect mastication; for if the meat be tough or the bread new proper comminution is impossible, and so digestion is more difficult. The fine subdivision of fatty food is also of great importance in regard to its digestion. The fat of hot mutton is indigestible because it cannot be pulverised, whilst cold fat can. The more minutely we can subdivide the fat the more easily it is digested. Many years ago Professor Hugo Kronecker asked Dr. Brunton: "How should butter be spread in a sandwich? Should the whole of it be put on one slice of bread and the other slice of bread simply put over the top of it, or should the pat of butter be divided into halves and one of them spread on each piece of bread?" The professor answered the question: "The butter should be divided into halves, and one spread on each piece of bread, because in this way the butter is more minutely subdivided, and thus not only gives a more agreeable taste, but is more readily digested." In regard to butchers' meat there are great differences, depending both on the kind of meat used and its condition at the time of cooking. Meat cooked in a state of rigor mortis was tough to eat, but the old Romans used to eat still newer meat; they suffocated their fowls in wine and cooked them forthwith, so that both meat which is perfectly freshly killed, and also meat which has been kept for a sufficient time, are tender. Dr. Brunton thought the taste for "high" meat was an acquired and morbid one. Eating high meat may overtax the antiseptic powers of the gastric juice and bile. The Esquimaux and Icelanders can consume decomposing food to an extraordinary extent without suffering. The effect of keeping may, to a certain extent, be imitated by the application of a vegetable digestive ferment. In the West Indies a tough beefsteak is rendered tender by rubbing it with the juice of a fresh papaw fruit, which contains a ferment, papaine, having an action very much like the trypsin of the pancreas. Bad cooking is another cause of imperfect digestion. Pleasant and repulsive food will act on the stomach through the nerve centres; while the idea of pleasant food will excite

appetite, the very idea of unpleasant food will excite disgust, and even bring on nausea and vomiting. The appearance of the table furniture may also exert an influence on the digestion. That food itself is a moral agent has long been recognised, and has found expression in the proverb, "A hungry man is an angry man." The favour with which Isaac blessed Jacob was augmented by the ingestion of savoury meats. Cookery may not only be a powerful moral agent in regard to individuals, but may be of great service in regenerating a nation. "Schools of cookery for the wives of working men in this country will do more to abolish drinking habits than any number of teetotal associations." A clear-headed clergyman in New York has perceived that dentistry may be a moral agent, and he has insisted on all the people attending his mission chapel keeping their teeth in good condition.[1] Since the clergyman adopted this plan he has had very much less trouble from drunkenness in his congregation. In Switzerland the relation between the consumption of alcohol and the quality of the cookery has recently been investigated. Savoury substances probably stimulate the circulation of the blood in the nervous centres.

Another important question is the kind of food which a person may eat. The appetite is the best guide for the healthy man. As Dr. Austin Flint very sensibly puts it, "the diet should be regulated by the appetite, the palate, and by common sense." The duration of the meal is an important item, and the comfort of digestion at a *table d'hôte* may be safely attributed to the forced slowness of the progress of the meal.

The pleasurable sensation of perfect satisfaction, ease, and quiescence of body and mind should be the criterion of sufficient alimentation. To effect this most agreeable of sensations and conditions—the real elysian satisfaction of the reasonable epicure—timely attention must be paid to the preliminary processes, such as thorough mastication and moderate or slow deglutition.

Many a man has been saved much misery by a weak stomach, which punished its owner by sickness or headache whenever he tried to overburden it, and thus checked his tendency towards excess at the very outset. The late Professor Laycock observed that patients recovering from a severe illness not infrequently have a craving for salt herrings, pork, or ham; but the fact is that these patients really want salt, and if salt be given them in the form of a mixture the appetite is appeased and the harm is avoided which the herring or ham might have caused. The degrees of digestibility of various meats, fruits, vegetables, and drinks were discussed at length. Sour wines are apt to set up gastric catarrh. A single glass of good wine sometimes disagrees, and some of the people who suffer in this manner also have an unpleasant burning feeling in the gullet whilst swallowing the wine, and Dr. Brunton suggests that hyperæsthesia of the mucous membrane may have something to say in the matter. Coffee does not affect the stomach to such an extent as tea. In its preparation, however, a substance called caffeon is produced, and this, along with the caffein which is present in coffee and tea, appears to dilate the abdominal vessels and cause a feeling of fulness in the abdomen, with a tendency to piles in some persons.

Another cause of imperfect indigestion is fatigue. When exhausted, it is far better to get forty winks before dinner than after. Walking or other exercise after a long day's work and prior to dinner, by exhausting the nervous system, was a potent cause of indigestion. Effects somewhat similar to those of fatigue may be produced by depressing or disturbing mental emotions or bodily conditions. Different emotions appear to affect specially, not only different organs like the heart and intestinal canal, but different parts of the digestive apparatus. Thus disgust affects the stomach, causing vomiting; fear is seen, in some of the lower animals, to affect the rectum, causing defecation; compassion affects the small intestine, producing borborygmus; worry and anxiety appear to have a very special influence upon the liver. In treating indigestion due to injurious mental influences, bromide of potassium, either alone or combined with bromide of ammonium, is very useful, both in lessening the sensibility of the nervous system to worry and in procuring sleep; for, as Shakespeare truly says,

> "Sorrow's weight doth heavier grow,
> Through debt that bankrupt sleep doth sorrow owe."

Disorders of the genital organs are apt to give rise to mental depression and to digestive derangements.

[1] The New York Medical Record, Feb. 24th, 1883, p. 224.

The pathology of indigestion and the action of remedies cannot be properly understood unless we constantly bear in mind the intimate relation which exists between the alimentary canal and the rest of the body.

The gastric tonics are chiefly vegetable bitters, and they increase the appetite, lessen flatulence, and tend to diminish discomfort and languor. Nux vomica is one of the most useful of this class, and the great benefit derived from its use is probably due to its stimulating action on the nerve centres, by which the coördination of the digestive processes is rendered more perfect. Carminatives tend to disperse flatulence; the ethers and volatile oils probably act by increasing the movements of the stomach and intestine, and altering them in such a way as to allow the gases they contain to escape upwards or downwards. Charcoal, subnitrate of bismuth, and binoxide of manganese would appear to act largely mechanically; and cases of dyspepsia are reported which have been successfully treated by the administration of fine sand. The ethers and alcohols are closely allied to the carminatives. The difficulty about alcohol is to define its place. There is a great deal of practical truth in the definition of dirt as "matter in the wrong place." In regard to the use of alcohol in dyspepsia, Dr. Brunton thought St. Paul's advice to Timothy was very good: "Drink no longer water, but use a little wine for thy stomach's sake and thine often infirmities." Another important chapter in treatment is the removal of waste products. The regular action of the bowels must be maintained at all cost. Headache from constipation is probably due, in part at least, to poisonous products formed in the intestine and absorbed from it, for Brieger noticed that it was only in the first stages of albuminous decomposition that alkaloids are formed, and afterwards they seemed to disappear. So that prolonged constipation without headache may be explained. The manner in which the salts of Carlsbad are used at the site of their natural origin accounts for the greater benefit derived from them than when they are used at home. The sipping has a powerful influence on the heart, as already pointed out in the first lecture.

One cause of biliousness, which deserves attention, is the alteration in the condition of the bile itself. Biliousness is accompanied by two different conditions of biliary flow. In the one kind the stools are clay-coloured from the absence of bile; in the other, the stools are either normal or are dark-coloured, from excess of bile. Certain bodies of the aromatic series have a powerful action upon the secretion of bile. Salicylate of soda is a powerful hepatic stimulant, increasing greatly the quantity and rendering very fluid the consistence of the bile. Other substances of the aromatic series, especially toluylendiamin, greatly increase the quantity of solids in the bile, so that sometimes the bile, from being viscid and thick, will no longer flow through the biliary capillaries, and jaundice results. A similar action may be exerted by poisons manufactured in the intestines. Mercurials may have an antiseptic action in addition to their other well-known effects. Horse exercise acts in a mechanical manner on the liver, tending to squeeze the bile out of the organ into the intestines; rowing, or its imitation in the gymnasium, may effect the same purpose. The alteratives, though ill-understood as is the manner of their action, must occupy an important place. The acids are probably a means of carrying out nitrogen in the form of ammonia, nitrogen which should normally pass out as urea. Nitro-hydrochloric acid is found to be clinically useful in patients suffering from eructations of sulphuretted hydrogen; it is also useful in oxaluria and depression of spirits. Ammonia and chloride of ammonium have a powerful action on the liver. Ammoniacal salts increase the formation of glycogen. Diuretics are useful in some cases of indigestion. Hot water is thus useful in some cases of gouty dyspepsia. Alkalies increase the diuretic effect, and effervescent citrate or tartrate of potash is useful both as a diuretic and as a local sedative to the stomach in neurotic and gouty gastralgia. By the frequent use of water as a diluent, either alone or with salines, the consequences of indigestion in regard to the lungs, heart, and head may often be averted or remedied. Asthma in gouty subjects is, perhaps, best treated by a mixture of bromide and iodide of potassium, and the addition of a little arsenic is said to increase the effect. Bromide of potassium is frequently useful in cases of intermittent pulse, though Dr. W. Begbie used with success a remedy composed of two grains of powdered rhubarb, ten of subnitrate of bismuth, one and a half of nux vomica, and three of compound cinnamon powder, to be taken before meals, and, if there

be acidity, ten grains of bicarbonate of soda or of magnesia may be added to it. It may be given in water or in a wafer swallowed along with a little water. Giddiness frequently takes the place of headache in persons of middle age suffering from biliousness, and both headache and giddiness are frequently connected with disorders of vision. Bilious headaches with tenderness of the globe of the eye may be relieved by small doses of salicylate of soda, half a grain in an ounce of water being taken every quarter of an hour or half an hour. Considerable attention ought also to be given in confirmed cases of indigestion to a most important method first introduced to notice by Weir Mitchell—namely, massage. A case of most profound emaciation, apparently dependent upon tubercular peritonitis, was narrated by Dr. Brunton in which the effects of massage seemed little short of marvellous. From the hasty sketch given of the disorders of digestion Dr. Brunton thought it would appear that although our knowledge of the subject is still very imperfect, yet a large number of observations have been accumulated which we may hope will, before long, enable us to understand the pathology more fully and to treat these disorders more perfectly.

ON

SOME COMPLICATIONS OF TRACHEOTOMY, WITH ILLUSTRATIVE CASES.

BY ROBERT WILLIAM PARKER, M.R.C.S.,
SURGEON TO THE EAST LONDON HOSPITAL FOR CHILDREN.

(*Concluded from p. 195.*)

3. *Irritative Changes due to the Presence of a Tube.*—In a few cases the mere presence of a tracheotomy tube in the trachea, even when perfect as regards length, shape, and size, appears to give rise to an irritation which is quickly followed by the growth of granulations. A considerable amount of granulations has been found in from four to eight days in cases which have terminated fatally. Such a condition may be suspected if the insertion of the tube appears to cause undue irritation, and especially if its insertion is followed by blood-stained secretion. The use of the feather also causes very considerable irritation, and has to be discontinued. In cases where the granulations about the external wound proliferate with unusual exuberance, such a growth may be suspected within. This peculiarity seems to depend on a hypersensitiveness of the tracheal mucous membrane, and it is an idiosyncrasy which must be taken into account. Minor degrees of this condition are often experienced, some tracheotomised children never reconciling themselves to the cleaning and changing of the tube.

If granulations spring up, the best treatment is the local application of nitrate of silver. A silver probe, after being suitably bent and coated with fused nitrate of silver, is introduced into the tracheal wound, and made to touch as nearly as possible those parts on which the tube has rested. Or a few drops of a thirty-grain solution of nitrate of silver may be allowed to trickle into the trachea, the child sitting upright and inclined slightly backwards, so that the solution may run over the affected portion of the trachea.

The granulations I am now alluding to may occur all round the trachea, and not merely on the anterior wall or at one spot; for they are not due to pressure, but, as before stated, to the presence of a foreign body in an unusually sensitive trachea. I append the drawing of a trachea (see Fig. 5) in which granulations due to this cause were very abundant over the whole track of the tube. There was no sign of ulceration; the granulations occurred within five or six days of the operation. The child appeared to be doing very well, until one night it was suddenly choked after a violent fit of coughing. The autopsy revealed the presence of granulations between the tracheal wall and the tube, which doubtless during life were florid and turgid with blood, and completely filled the space; one currant-like granulation, larger than the rest and attached to a small pedicle, had apparently been driven by the coughing into the tube and completely occluded it.

In the case of warty laryngitis—that is, when there is a natural tendency to the formation of warts—the irritation of a tube leads to the production of minute warts, instead of granulations proper, as seen in Fig. 3, below the tracheal opening. In the case of granulations proper, some difficulty is usually met with in the removal of the tube. At first sight the obvious remedy is the removal of the cause; but an acute obstruction having necessitated the use of the tube, granulations having occurred and actually existing, the difficulty arises of how best to treat them. Such cases all point to the desideratum of tracheotomy without the use of tubes at all. At present, I have not been able to dispense with them; nor do I know of any trustworthy means of gaining the desired objects without tubes; at the same time it is a desideratum I constantly have in mind, and which I recommend to the consideration of my professional brethren.

As to treatment, reference has just been made to the use of nitrate of silver once a day, or once in two days. The alum spray or tannin spray (an ounce of tannic acid glycerine in seven ounces of water) must be used at frequent intervals through the day and night. The tube should be removed for as long as possible, and the silver plug inserted, the patient being meanwhile under direct supervision; for on the removal of the tube, the granulations swell out, and if present in quantity they in time occlude the trachea. Hence in a few instances a child will breathe well for an hour or two, then the tube must be reinserted. The explanation appears to be as follows. The tube by its presence keeps back the granulations, but having been removed, they commence to swell up; possibly also the more laboured breathing (which follows the removal of the tube), by causing congestion, helps them to still further occlude the trachea. Cauterisation and astringents are the best remedies, and are generally successful.

FIG. 5.

4. *Accidental Conditions.*—Under this heading I shall include two cases, which, though not unique instances, are nevertheless so rarely met with as to require separate consideration. They appear so purely accidental in their incidence that none but the most general precautions can be taken to guard against them.

CASE 6. *Catarrhal Laryngitis; Tracheotomy; Difficulty in removing Tube; Hypersensitiveness of the Trachea; Death in Convulsion fifteen days after removal of Tube; Autopsy; large Granuloma at the seat of cicatrised Wound inside the Trachea.*—Eliza M——, aged two years and a half, was admitted into the hospital under the care of my colleague, Dr. Eustace Smith, on February, 1882. She was one of eight children, of whom one had recently been suffering from quinsy. She had enlarged glands about the neck, secondary to eczema capitis, to which disorder she was very subject. She was a plump, well-nourished child, and well-grown for her age, with no very manifest signs of rickets. On admission she was said to have been hoarse for two days; she had that morning complained of having "a pin in her throat." She had had no discharge from her nose, and there was no illness in the house. Her breathing had become so laboured by the following day that tracheotomy had to be performed by Mr. Battams; the high operation was done; chloroform was administered by Mr. Sanderson, one of the resident officers. No membrane was got up or seen. The child did fairly well; efforts to remove the tube, however,

were not successful until March 15th, thirty days after the operation. It was remarked at the operation, as well as subsequently, that the child's trachea was remarkably sensitive; she coughed violently whenever it was necessary to clear the tube or attend to the wound, and one of the difficulties which attended the attempts to remove the tube appeared due to this hypersensitiveness of the tracheal mucous membrane. Finally, the tube was removed, and the external wound gradually closed up. The child breathed fairly well in the day-time, but had attacks of urgent dyspnœa, becoming progressively worse during the nights, with some nights of comparative immunity. The voice was not hoarse. On March 31st, forty-six days after the operation, the child died in a convulsion after an attack of dyspnœa rather worse than usual. The trachea was again opened, but too late to save life.

The autopsy revealed the condition depicted in Fig. 6. "At the site of the old tracheal wound is a highly vascular livid red mass of granulation, more or less pedunculated, projecting into and considerably narrowing the trachea at this point. The ary-epiglottic folds are very œdematous."

In this case the laryngo-tracheal mucous membrane was exceedingly sensitive, and doubtless also somewhat œdematous. Thus breathing was rather more laboured than normal after the tracheal tube had been removed. The granuloma doubtless gradually developed and increased in size, and finally, during an unusually severe paroxysm of laboured breathing, it became extra turgid, and so completely occluded the cricoid opening (which is the narrowest part of the windpipe), and thus killed the child. A fatal termination to a case of tracheotomy from this cause may be regarded as a rare event. Dr. Petel, in his graduation thesis,[1] only collected ten such cases in addition to the one he himself recorded. In three of the cases a second operation was performed with complete success. In one case the child was tracheotomised three times, and had still to wear the cannula. In another case the polypoid granulation was spontaneously coughed up. In three cases death resulted before help could be given. In two cases the condition, which had not given rise to any symptoms, was only discovered at the autopsy, death having taken place from some other cause. In a minor degree, nevertheless, I am inclined to think that such a condition is not very uncommon. There are no *a priori* grounds why granulations should not spring up on the deep surface of the wound as they do on the superficial. On the latter granulations, sometimes very exuberant, are the rule. From a study of the published cases it appears that the granulations have most frequently grown from the upper angle of the wound—that is to say, immediately below the cricoid opening, the point where their presence would be most dangerous. The possibility of such an occurrence has even been urged, but I think the grounds very insufficient, as an argument against the high operation. This condition may be suspected—the patient having previously undergone tracheotomy, the tube having been removed, and the wound being more or less cicatrised—if the breathing again becomes gradually and temporarily embarrassed, the voice generally remaining unaffected. At first this embarrassment will be chiefly obvious at night, when the child is asleep; then during the day-time also. It will be paroxysmal, and vary much in intensity; in the later stages expiration will be as much impeded as inspiration (or more); there will probably be blood-stained expectoration, especially after paroxysmal coughing. It is probable also that the external wound may have exhibited a tendency to exuberant granulations. Given such signs, what is to be done under the circumstances? The surgeon will have to be guided by the intensity of the resulting dyspnœa; if it tends to improve slowly, the use of the alum or tannin spray may be continued; if it tends to become more marked, a second operation will have to be undertaken and an examination of the part made, with a view to the removal (if present) of the granulations by forceps, caustic or otherwise. In his interesting graduation thesis Dr. Carrié[2] says, p. 63:—"In these circumstances, with difficulty [of breathing], recession, noisy breathing during the night, we must not await a first access of suffocation, which may prove fatal, but at once re-open the trachea."

CASE 7. "*Croupy*" *Cough; urgent Dyspnœa; Tracheotomy; Inability to remove the Cannula; Sudden Death three months later; Autopsy; Web-like Adhesions between the Cords.*—A little boy, eighteen months old, came under observation on account of a "croupy" cough and dyspnœa, which subsequently necessitated tracheotomy. No membrane was got up. At the end of a week attempts to remove the tube were commenced. They were quite unsuccessful, and remained so. The child's general condition was good, and he appeared well in all respects except that he could not get on without his tube. One night he was found dead in bed. No sound had been heard by the night nurse, who had just previously looked at him and found him sleeping comfortably. The bedclothes were quite undisturbed. His eyes were closed, and his features free from any sign of a death-struggle. The autopsy revealed the following condition. The lymphatic glands, tonsils, follicles of the pharynx, and root of the tongue were very much enlarged. On the anterior wall of the œsophagus, opposite the shoulder of the tube, there was an oval diphtheritic patch three-quarters of an inch long, corresponding with a similar condition on the posterior wall of the trachea. Looking into the larynx from above the vocal cords were seen to be much swollen. Looking up the trachea from below there was no visible passage; in fact, immediately above the tube there was a diaphragm of granulating and cicatrising tissue, which had a short, unattached margin opposite the posterior wall of the windpipe and

FIG. 6.

nowhere else. This septum would impede inspiration greatly and expiration altogether. There was great ulceration of the mucous membrane opposite the end of the tube.

5. *Ulceration in the Trachea, due to ill-fitting of the Tube.*—This condition is now of much less frequent occurrence than formerly. M. Roger was the first to draw prominent attention to the subject, and to suggest at once the cause and the remedy.[3] As I have no personal cases to relate, I must summarise M. Roger's views and conclusions. He showed that the complication was more liable to occur in some cases and in some epidemics than in others; but from the anterior wall being most affected, and just at the place corresponding to the lower extremity of the tube, he argued that the chief cause of the ulceration was pressure of the tube, "l'action vulnérante de la canule." This condition is most to be feared when the tube has to be worn for a longer period than usual, but it has been found as early as thirty-six hours after the operation. The ulceration may be only superficial, or it may be deep enough to perforate the trachea; and, as cases are recorded in which the innominate artery has been opened, it will be allowed that this complication is a very formidable one. As symptoms of this form of ulceration, M. Roger gives the following. It is to be suspected if the external wound assumes a sloughy condition, and if the breath and expectoration become fetid, the tube will be blackened, either entirely or in patches,

[1] Des Polypes de la Trachée, survenant après Cicatrisation de la Trachéotomie. Thèse de Paris, 1879, No. 500.

[2] "Contribution à l'Etude des Causes empêchant Ablation définitive de la Canule. Thèse de Paris. 1879, No. 13.

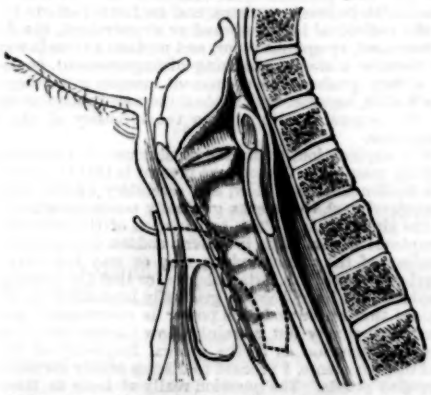
[3] Archives Générales de Médecine, 1859, vol. ii.

and there may be pain or difficulty in swallowing. Most of these symptoms, however, may occur without the presence of ulceration, as I have seen on many occasions. The difficulty of recognising the onset of this ulceration, no less than its dangerous nature, render it incumbent on the surgeon to watch his patient closely on the one hand, and on the other only to use such tubes as are comparatively safe and unlikely to press on the trachea.

M. Roger tried different materials—gutta-percha, india-rubber, flexible ivory; but finally discarded them in favour of silver, recognising that the ulceration depended on the unsuitable shape of the tube, rather than on the fact of its being rigid: "La forme des canules habituellement en usage n'est pas celle qui conviendrait le mieux" (p. 180, op. cit.). After many unsuccessful trials, M. Roger finally adopted Lüer's tube with the movable collar.

While admitting the immense improvement which was thus effected, I am inclined to think that much of the mischief was really due to the quarter-circle shape of the tube itself. A glance at the annexed drawing (Fig. 7), which

FIG. 7.



Outline figure of the trachea, showing its direction, and also an ordinary tube *in situ*.

represents the trachea in frozen section, will show that such a tube must of necessity press upon the anterior wall of the trachea. With a view to remedy this defect, I suggested some years ago an "angular" tube. An extended use of this tube leads me to think highly of it, and justifies me, I hope, in recommending its adoption by others. The drawing (Fig. 8) shows how its lower half, by being directed

FIG. 8.

The angular tube.

backwards and downwards, corresponds with the direction of the trachea, and that, however long, it can never press upon it. If this tube be imagined in the trachea in place of the quarter-circle tube, as seen in Fig. 7, the advantage I claim for it will be conceded.

I will conclude by recommending surgeons to be well provided with a variety of sizes; slight differences in length of the tube, in depth from the front opening to the "angle," and in calibre, I believe, often turn the balance one way or another. A tracheotomy tube, like a boot, must fit comfortably, or it cannot be worn without injury. In order to make the inner tube pass the angle, its posterior wall has to be cut away; let me advise that as little as possible be removed. It is impossible to give too much attention to the manufacture of the tubes; all roughnesses and sharp edges must be avoided. Finally, I think it would be an improvement if the interior of the inner tube were polished, for it could be more easily cleaned.

Perhaps the day will come when we shall be able to dispense with tubes altogether; at present I know of no efficient substitute, though, as I have already said, my thoughts are constantly engaged in this direction.

The points in common in the foregoing, widely different, cases were urgent dyspnœa, necessitating operation, and subsequent difficulty in removing the tube; it will be seen on what a variety of causes the latter point may depend, and how important a correct estimate of its real one becomes. Since writing the above, I have operated for the second time on a little boy, and found a mass of granulation tissues blocking up the cricoid ring. In addition there appeared some cicatricial narrowing in the upper part of the trachea. The boy is still under treatment, and I am rather fearful that he will have to continue to wear his tube, until further growth in the trachea—which goes on very rapidly as adolescence approaches—has taken place.

Old Cavendish-street, W.

THE QUESTION OF THE IMPORTANCE OF FLEXIONS AND DISPLACEMENTS OF THE UTERUS.

BY GRAILY HEWITT, M.D., F.R.C.P.,

PROFESSOR OF MIDWIFERY AND DISEASES OF WOMEN, UNIVERSITY COLLEGE; OBSTETRIC PHYSICIAN TO THE COLLEGE.

IN a former paper[1] I offered some remarks on the recent statistics of Vedeler and Herman as bearing on "the question of the importance of flexions and displacements of the uterus." Dr. Herman has since[2] replied, and I hope to be permitted to make some further observations on this subject. Notwithstanding Dr. Herman's objections, I still maintain that these statistics do not give trustworthy evidence as to the actual frequency of flexions of the uterus in really healthy subjects, considering, as I do, that in all probability many of the supposed healthy individuals would have given evidence of presence of symptoms had such been carefully and sufficiently looked for, and for other reasons previously stated. But supposing for the sake of argument we agree to waive the point as to the health of the subjects of the statistics in question, how far do they support the view that flexions are in themselves of no pathological importance?

It has been made a reproach to me that before generalising in the way I have done on the subject of flexions (and displacements) of the uterus I should have proceeded differently, and should have ascertained the frequency of flexions in women generally who are in a state of health. It is easy to make the criticism, but it is not easy to make observations such as would satisfy all requirements in any considerable number on women in a state of health. The statistics which have been put forward by Vedeler and Herman, and which profess to offer the desideratum in question, I have already commented on, and have objected to them for reasons which still appear to me good reasons. But, nevertheless, I consider that they constitute a valuable contribution to the facts necessary for the discussion of the subject. These statistics do not, in my view, invalidate the conclusions I had arrived at as to the importance of flexions and displacements of the uterus. The statistics in question are intended to show that in cases not offering marked symptoms, uterine flexions are common. But supposing this to be correct, it does not follow that severe symptoms may not, or will not, arise in association with further increase, gradual or sudden, in the degree of the flexions and displacement of the uterus. In my recent paper I stated that "the sufferings of which patients complain are of such a kind as to prove that they are directly related to movements of the uterus, to exaggeration of existing flexions, and the like." Flexions of the uterus are in many cases of slow growth, and may for a time, long or short, give rise to few symptoms; but an accident, or a strain, or long-continued over-exertion, may so increase and intensify a previously slight flexion that acute sufferings begin there and then to show themselves. Analysis of cases under my notice has shown the great frequency with

[1] Vide THE LANCET, June, 1884. [2] Ibid., Oct. 1884.

which injury, falls, accidents, &c. were found responsible for the illness from which the patient suffered, as I have shown in the last edition of my work. When such cases come before us it, of course, generally happens that we know nothing for certain as to the state of the uterus before the accident. In some, probably the uterus was in a tolerably normal condition, but it is probable that in most of such cases, and this view is favoured by these recent statistics, the uterus was affected with flexion to a certain degree before the accident, injury, overstrain, or what not, and was therefore more readily and seriously pushed out of its proper place, and more considerably altered in shape, by reason of that existing predisposition. Further, if the previous history of cases of this kind be carefully gone into, it will be found that in many instances facts will be revealed intimating a more or less long-standing disability on the part of the uterus, although the ailment had not been sufficiently severe to call for medical interference, and the subjects of these slight ailments having been reputed to be in health. The transition from health to disease is often slow, and the organs of the body though altered perceptibly to the anatomist from what is considered the true healthy standard may not give evidence of such alterations in the shape of symptoms. Flexions of the uterus are in this category, and in many cases they may attract for this reason no attention. But admitting this to be true, it has still to be considered what is their clinical importace as predisposing to more decided and serious alterations in the uterus? What in fact is the relation subsisting between a patient with flexion, but without suffering, and another who presents a condition of suffering in conjunction with flexion to which are found added congestion, marked derangements of the functions of the uterus of various kinds, &c.? It is plain that this question can only be answered by careful clinical inquiry. One thing is certain, that some women are "weakly" in regard to the uterine organs, and some are comparatively "strong" as the phrase is. There is a predisposition to further and more decided disease in the weakly individuals, and this predisposition is, according to my belief, founded on long experience, a condition of the uterus such as allows it too readily and too easily to assume a more or less flexed shape. It is easy to understand that this kind of predisposition is common, for the number of young women who are really "strong" is not very great.

It is further to be pointed out that when the uterus is flexed, the fundus being directed forwards or backwards, offers a mechanical condition which probably favours to a considerable degree the occurrence of further flexion or the intensification of such flexion. Forces acting downwards, such as severe straining, will necessarily, as it appears to me, cause the free end of the lever, which is also the weightier, under these circumstances, to descend lower in the pelvis. Dr. Berry Hart, in criticising my views on the etiology of flexions, has pointed out that the central part of the uterus not being a fixed point, the effect of such downward pressure will be to cause rather a prolapsus than an increase of flexion. The effect will, no doubt, vary in different cases, and unquestionably a general lowering of the uterus would be a part of such effect (it may even be the chief effect in some instances); but it will probably be conceded that the fundus of the uterus is more free to move forwards or backwards than is the central part of the uterus to move downwards. Therefore, my idea is that, as a general rule, when the uterus is already flexed, a straining force downwards will force the uterus as a whole somewhat lower in the pelvis, but that it will also considerably intensify an existing flexion. In many instances the intensification of the flexion is, as I have repeatedly observed, the main effect resulting.

Flexion of the uterus implies a certain degree of displacement of the organ. When the uterus is abnormally bent backwards, for instance, the fundus is a position of displacement, and the cervix is also more or less displaced. There may be also a displacement of the organ as a whole downwards. There are therefore three possible factors usually combined. (*a*) The bending; (*b*) the anterior or posterior displacement of the fundus, and also to a less degree of the cervical part of the uterus; and (*c*) descent of the uterus as a whole. In different cases there will be a different intensity in each of the three factors in question, and the degree of suffering observed would be expected to vary accordingly. The symptoms resulting are most intense when each of the three factors is present in a marked degree. Mere displacement without flexion is often attended with symptoms, sometimes severe ones, but clinical facts show that taken as a whole versions, for instance, are incomparably less important as regards production of symptoms than those cases in which the uterus is bent. This, to my mind, is one of the great proofs of the importance of the latter condition. In speaking generally, however, of the importance of flexions, I have, as will be gathered from my writings, attributed a due share in regard to the sufferings present to the conditions concomitant with flexions, above categorically described—viz., the factors *b* and *c*. When the uterus, being flexed, retains its ability to move, or is "free to move," there may be no symptoms, and temporary intensification of the flexion may be unattended with such decided symptoms as to induce the seeking medical relief. But when congestion of the uterus, fixation of the organ in its bent shape, and non-capability of restitution after a bending force has been applied,—when these events have occurred, decided symptoms will not long be postponed. No doubt there are a multitude of cases in which the condition is one which may be described as being on the borderland; the individual suffers a little, the uterine functions are not well performed, the uterus is more or less flexed. The health improves perhaps, and no further efforts follow; or the individual is overworked or overstrained, the flexion is increased, symptoms occur, and medical advice is sought; or there is a slowly occurring disimprovement, consisting in a very gradual but permanent increase in the degree of the flexion, together with gradual increase in the disturbance of the general health and in the intensity of the local symptoms.

The explanation, therefore, of absence of symptoms in certain cases when flexions are present is that the growth of the flexion has been slow, and secondary effects have not been developed, the uterus gradually accommodating itself to the altered shape. The explanation of the occurrence of symptoms is that there is either a sudden displacement and bending of the uterus, which may or may not have been previously flexed to a certain degree, or that the bending and displacement have become gradually intensified up to such a point that accommodation power is overstepped, and the symptoms slowly but certainly show themselves. Leaving now the question as to the general frequency of flexions and displacements, I proceed to discuss briefly certain other disputed points. The question really at issue in these discussions regarding flexions is the influence exercised by them in bringing about other conditions, termed variously chronic inflammation, congestion, &c., which all recognise as abnormal. These other conditions are, it is admitted, frequently found associated with flexions, and they have to be explained. At the present moment the explanation which has been given of their occurrence, that they are traceable to the presence of flexions and displacements, is contested on various grounds, one being the fact that flexions are frequently found in cases where there is no other alteration. This argument I have already dealt with, but others remain to be considered. The question as to the manner in which "congestion" of the uterus is produced is a vital one in uterine pathology. I was led to form my present opinion on this subject by clinical observations simply and solely. Having so constantly observed that patients suffering from congestion of the uterus were relieved, and the congestion diminished, by altering the position and shape of the uterus, it naturally occurred to me that the congestion must be due to the altered shape and position of the uterus, and the result above described was found to follow so frequently as to leave no doubt in my mind that the congestion was in great part, at least, a mechanical one. Constant observation of the phenomena described, extended over some years, has induced me to consider this account of the causation of congestion of the uterus in the vast majority of cases as accurate. And I am convinced that change of shape of the uterus, such as is involved in the sudden production of a severe flexion, or in the continued and gradual intensification of a previously existing flexion, is precisely what constitutes the principal factor of congestion of the uterus as it is clinically met with. The mere change of shape, occurring in this way, affects the uterine circulation, I believe, by impeding its free course at or near the centre of the bend. In cases of flexion, however, there is always more or less displacement, and not seldom a displacement directly downwards, so that the pressure of the uterus may no doubt interfere with the circulation outside the uterine walls, and in other methods presently to be mentioned. I

repeat, the effect of straightening the flexed uterus in reducing an accompanying congestion has so constantly shown itself in cases under my observation, that flexion and congestion appear to me to stand in positive relation as cause and effect. That such a relation does exist has been admitted by Klob, a pathologist of repute, by Thomas of New York, and others. The well-known power of adjustment in regard to the circulation which other organs possess is doubtless possessed by the uterus. And for this reason, when the uterus has become gradually altered in shape the impediment in the circulation might be slight and the resulting congestion trifling in degree. For this reason flexion of the uterus may be present without marked congestion. But the question is, What will happen when the uterus becomes suddenly and markedly bent to a greater degree than before? Then it is that the phenomena of congestion of a mechanical character would be reasonably expected to be observed. Under such conditions I have repeatedly known it to occur. I say "known," meaning thereby that I have found severe congestion and acute flexion present on examination shortly after accidents, injuries, falls, strains, and the like, whereby the patient has been made suddenly ill. Further, there is abundant evidence afforded by the study of chronic cases of flexion that in many instances congestion to a slight degree has been present for a long period, leading eventually to productions of decided symptoms and without occurrence of any severe or sudden accident. I confidently appeal to clinical observation for confirmation of the above statements.

(To be concluded.)

ARTIFICIAL CIRCULATION AS A MEANS OF RESUSCITATION AFTER APPARENT DEATH.

BY CHAS. EGERTON JENNINGS, F.R.C.S.ENG.,
ASSISTANT-SURGEON TO THE CANCER HOSPITAL, ASSISTANT-SURGEON TO THE NORTH-WEST LONDON HOSPITAL.

I. CHLOROFORM POISONING.

THOSE experiments which were published in THE LANCET, Sept. 1st, 1883, being insufficient to demonstrate several points in connexion with transfusion which require elucidation, I have, at the suggestion of Sir Spencer Wells, performed a series of experiments upon dogs at Ghent. As elsewhere stated,[1] the experiments performed in Dr. Pye-Smith's laboratory at Guy's Hospital having indicated that transfusion of blood and the intra-venous injection of saline fluid might be invaluable in certain cases of poisoning, the opportunity seemed favourable for testing the efficacy of the plan I have suggested where poisoning has occurred from the administration of chloroform. To M. Nuel, for the use of his laboratory at Ghent, and to MM. Boddaert van Custem, van Duyse, van Imschoot, Cleays, and Adenaw, for unwearying assistance in this work, my lasting obligations are expressed. I desire particularly to refer to Dr. Ringer's paper in THE LANCET (1883, vol. i., pp. 628-9), "Concerning the Effects of Dilution and Concentration on the Action of Poisons;" and to Dr. B. W. Richardson's paper on "Death from Chloroform," in the *Medical Times and Gazette* (1870, vol. ii., pp. 85-6), and to his communication to the Royal Society in 1865 on the "Possibility of restoring the Life of Warm-blooded Animals," &c., wherein a method of artificial circulation is described.

Experiment 1.—Repetition of the experiments already referred to (q.v.), to demonstrate the method of transfusion of blood and saline fluid, with subsequent repletion of the donor with saline fluid.—July 16th, 1884, 4.30 P.M.: Weight of giver, 47·35 lb. Weight of receiver, 40·74 lb. Hypodermic injection of morphia (3 gr.) for each dog. Coma becoming quickly profound in the receiver, $\frac{1}{75}$ gr. atropine was subsequently injected into this animal. Transfusion was established between the right external jugular veins of the dogs, the receiver being simultaneously depleted on the cephalic side of the cannula. The saline fluid employed (temperature 78° F.) contained rather less than half a minim of liquor ammoniæ to each ounce. After the transfusion of blood and saline fluid, the giver was repleted with saline fluid. The entire quantity of saline fluid injected into the dogs was 46·9 oz. Chloroform was the anæsthetic employed. After the experiment the donor had gained 3 oz. 290½ gr.; since also this dog had vomited considerably after it was first weighed, the injection of saline fluid was still more in excess of the quantity of blood lost by transfusion. The receiver gained 21 oz. 162 gr. Thus it will be seen that in order to demonstrate the important point that blood would not coagulate in the instrument *in transitu*, the transfusion was very abundant, that the test might be a crucial one, and it appeared: (1) That the admixture of saline fluid with blood was capable of rapid and precise regulation; (2) that when the quantity of blood passing through the connecting tube is considerably less than the saline fluid, the former flows as a core, or as strands within the latter medium, the saline fluid being of the lighter specific gravity. Thus protected, the blood is not subjected to friction along the inner surface of the tubing. The transfusion of blood and the quantity of saline fluid injected into the receiver having been so great, it seemed probable that this dog might eventually perish from disorganisation of the corpuscles, and it was decided to repeat the experiment, keeping the injection of the saline fluid within the bounds of safety. And since the amount of saline fluid which can be safely substituted for blood holds a definite ratio to the quantity of blood in the body (the substitution may be carried to the extent of about one-fifth of the blood in man), it is clear that the experiment cannot be pushed so far on a small dog as the injection of saline fluid can be carried with safety in actual practice on human beings. The receiving dog died on July 30th. The autopsy showed that the vessels were exceedingly engorged with fluid blood of a dark colour. All the organs were engorged, especially the kidneys. Examined microscopically the kidneys did not exhibit notable changes. The animal was extremely fat, and there was fatty degeneration of the liver. The costal cartilages were firmly ossified. The dog was an old one, and had lost one eye. The dog which had supplied the blood recovered.

Experiment 2.—July 24th: The dogs each weighed about 12 lb. The receiver was depleted on the distal side of the afferent cannula to the extent of 8¾ oz. Transfusion of blood and saline, followed by repletion of the giver with saline fluid. Forty-four ounces of saline fluid at 85° F., with twenty minims of liquor ammoniæ, were injected into the dogs. This experiment confirmed the preceding; it was performed under mixed narcosis. The apparatus was now washed and taken to pieces; the vein of the giver was ligatured, and the wound closed with sutures. On attempting to tie the vein of the receiver, the animal, having recovered from the anæsthetic with unusual rapidity, struggled. Chloroform was administered with a small supply of air. The dog held its breath for a few moments, suddenly took three or four short inspirations, and (apparently) died instantly. It was proposed to attempt reanimation by means of injecting an ammoniated fluid towards the heart, and depleting from the distal side of the cannula. The apparatus was put together, and the saline fluid which had been prepared for the experiment just performed being exhausted, and there being no hot water at hand, cold distilled water, to which a few drops of liquor ammoniæ had been added, was injected into the jugular vein. The dog was depleted simultaneously. There was no response, and though the time before the operation was commenced was not noted, it was certainly considerable, as will appear from the description which has been given. As a last resort, four minims of liquor ammoniæ were injected by a syringe into the rubber tubing of the syphon, near the cannula, whilst the fluid was flowing. Instantly the heart's action was restored. The heart sounds, as heard by the stethoscope, were exceedingly rapid and forcible. The circulation was re-established; the pulsations of the arteries were very strong and fast; muscular contractions occurred. Artificial respiration was tried, but normal respiration was never resumed. The dog probably died from ammonia poisoning. The experiment with regard to resuscitation after chloroform poisoning was complicated in that it was performed after the dog's blood had been diluted by the previous transfusion of blood and saline fluid, and would not therefore tolerate the further dilution which the method of saline intravenous injection with simultaneous depletion involves. The blood giver recovered perfectly.

Experiment 3. — This was undertaken to test the value of the intravenous injection of an ammoniated saline fluid,

[1] British Medical Journal, April 26th, 1884.

with simultaneous depletion, for chloroform poisoning. The apparatus used was a simple syphon (Fig. 1) charged with saline fluid, containing a small percentage of ammonia. Near the cannula was a T-shaped glass interruption (inverted), the additional limb being surmounted by a short rubber tube and burette clip. This T-tube served not merely the purpose of an air-trap, but, by means of a syringe, a solution of ammonia stronger than that contained in the syphon could be injected into it at pleasure. On July 25th, at 2 P.M., 1½ gr. of morphia was injected subcutaneously into a dog weighing 14·31 lb. At 2.30 the coma was very profound; $\frac{1}{15}$ gr. of atropia injected. At 3.30 chloroform was administered on a towel by Dr. Boddaert very freely, with a small supply of air, till respiration and circulation had ceased. The tongue was then drawn out of the mouth and artificial respiration performed. Respiration and circulation were re-established. Chloroform was given again very freely. The respiration and circulation again stopped. Artificial respiration was performed. Respiration and circulation were again restored. Chloroform was again exhibited. The circulation and respiration ceased, and could not be restored by the performance of artificial respiration. The right external jugular vein was now exposed and grasped with a Wells's forceps at a point corresponding to the centre of the incision. The cannula of the syphon was inserted, by the help of a phlebotome, into the vein on the cardiac side of the forceps. The cannula was secured in its place within the vein by the application of a cannula pin and waxed ligature (Fig. 2), that it should not slip. The vein was opened on the distal side of the forceps. The quantity of blood drawn was about 8¾ oz. (besides a good deal wasted), and the quantity of the saline fluid injected was about 21 oz. at 90° F., containing 10½ minims of liquor ammoniæ. One minim and a half of liquor ammoniæ was also injected by the syringe. The intravenous injection and depletion were quickly followed by restoration of the circulation. Artificial respiration was now sedulously performed, and reanimation became perfect. The dog gained by the experiment about one-third of a pound in weight. This animal completely recovered. Since the injection and depletion appeared to have been carried further than necessary, it was decided to repeat the experiment, and to

FIG. 1.

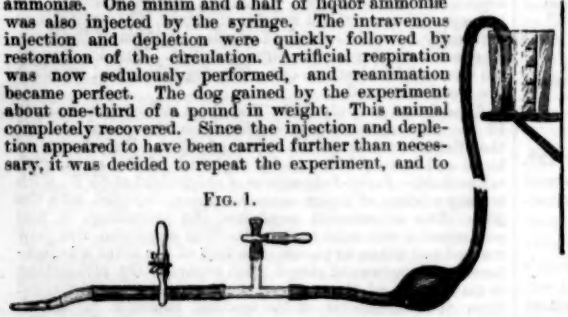
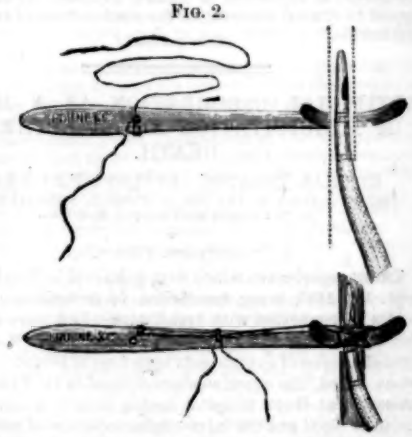


FIG. 2.



draw a little blood after the intravenous injection had been commenced.

Experiment 4.—July 25th: A black-and-tan dog; weight, 13.1 lb. 2 P.M.: Hypodermic injection of morphia, 1½ gr. 2.30: Atropia, $\frac{1}{15}$ gr. At about 5 P.M. the dog was poisoned with chloroform, and after the circulation and respiration had ceased, artificial respiration was ineffectually tried. After opening the external jugular vein with the phlebotome, the cannula, first entering between the vein and its sheath, was withdrawn. Blood escaped from the aperture in the vein, and a convulsion occurred. The aperture was now grasped with forceps, and the cannula inserted into the vein on its cardiac side. Ammoniated saline fluid was injected into the vein, but there was no return of animation. Depletion on the distal side of the cannula was tried, and the blood, which hardly flowed at first, was of a dark colour and tarry consistence. More saline fluid was injected, and three minims of liquor ammoniæ by the syringe. No signs of reanimation appeared. Artificial circulation was carefully performed, and altogether 23 oz. of saline fluid were injected. The quantity of blood drawn was not measured. On examining the heart, post mortem, its cavities were greatly distended with coagulated blood. It was resolved to repeat the experiment, but to deplete freely in the first instance, in order to relieve the heart and cerebral vessels of all engorgement.

Experiment 5.—July 27th: Weight of dog 11 lb. 3.15 P.M.: Injection of morphia, 1 gr. At 3.45 chloroform was freely administered on a towel with a small supply of air. The anæsthetic was exhibited for about a quarter of an hour, the respiration becoming shallower and fewer in number, and the pulse feebler towards the expiration of that period. At 4.1 the respiration ceased entirely. At 4.2 20 sec. the femoral pulses, which Dr. van Duyse and myself had been carefully feeling, ceased. The tongue was now drawn out forcibly with artery forceps, and artificial respiration was performed. Signs of animation not appearing, the operation was begun. A cannula was introduced as quickly as possible into the right external jugular vein, and tied therein. The dog was depleted on the distal side of the cannula, but the blood at first ran slowly and was of a very dark colour. At 4.5—i.e., 2 min. 40 sec. after the heart had ceased to beat—the injection of 8 oz. 7 dr. of saline fluid at 90° F. with about 4 minims of liquor ammoniæ was commenced. Artificial respiration was persisted with. The flow of the blood became freer, and of a brighter colour. Return of pulsation in the arteries was noticed at 4.10 precisely. Therefore the pulsations had been absent during a period of 7 min. 40 sec. The pulsations were now so forcible that it was feared a poisonous dose of liquor ammoniæ had been injected, but such was not the case. At about 4.30, after the experiment was concluded, the dog on being released ran about briskly. The amount of blood lost by depletion was not measured accurately, some being spilled. It probably was between 6 and 8 oz. 5 P.M.: It was noticed that whilst the dog walked about, curious tetanic contractions of the muscles of the extremities occurred. This point is of importance, for it has been shown that the injection of ammonia into the veins, in a toxic dose, causes tetanic spasms, which cannot be distinguished from those produced by strychnia.[2] This animal recovered satisfactorily.

Experiment 6.—July 27th, 3.15 P.M.: One grain of morphia was injected subcutaneously into a dog weighing 16·5 lb. The administration of chloroform was commenced at 6.15. The pulse became intermittent at about 6.34, and ceased entirely at 6.34 30 sec. The respiration ceased at the same time as the pulse, and could not be restored by artificial respiration, the tongue having been drawn out. Depletion with the injection of an ammoniated saline fluid (34½ oz.) was performed at 6.38—i.e., three minutes and a half after apparent death. No signs of animation ever appeared. Probably the operation was begun too late after the cessation of the pulse. Further, at the commencement of the infusion the flow of blood was arrested by a coagulum which formed at the aperture made in the vein on the distal side of the cannula. So that what occurred in Experiment 4 took place here also—viz., that the heart, already paralysed by the chloroform, was distended by the infusion, which was in excess of the depletion. This hypothesis was supported by an examination of the heart and lungs, which were found to be enormously engorged. The quantity of blood lost—but not at the outset—was great; but, as already intimated, not so great as the quantity of fluid injected.

Experiment 7.—July 28th, 10.50 A.M.: One grain of morphia was injected into a dog, which weighed 18 lb. Chloroform was administered at 11.30. The pulse became irregular at 11.36, and ceased just before the respiration at 11.40. After the tongue had been withdrawn by artery forceps, and after artificial respiration had been ineffectually

[2] Richardson, Cause of the Coagulation of the Blood, p. 440.

tried, the right external jugular vein was exposed and grasped with forceps. The animal was bled on the distal side of the forceps and a cannula was inserted into the vein on the proximal side. At first it seemed doubtful whether the cannula was properly inserted within the vein; it was therefore withdrawn and inserted in the left external jugular vein. The depletion and injection of nearly 30 oz. of saline fluid at 100° F., with 15 minims of liquor ammoniæ, were commenced at 11.43—i.e., three minutes after apparent death. Four minims of liquor ammoniæ were injected later on by means of the syringe. Artificial respiration was performed concurrently with the maintenance of the circulation; but pulsation not returning, the region of the fauces and larynx was inspected. It was noticed that comparatively little air entered the lungs during their expansion, owing to the fact that the epiglottis, which was flaccid, was drawn down like a valve over the superior orifice of the larynx. The epiglottis was drawn forwards with another artery forceps, and in a few seconds, at 11.55—i.e., fifteen minutes after apparent death—forcible pulsations were detected in the femoral arteries. Contractions of the muscles of the jaws occurred, and also of those of the extremities. The mouth being closed, and the forceps which grasped the epiglottis having been necessarily removed, the indication seemed to be tracheotomy, which was at once performed. But the action of the heart suddenly stopped, and life departed. An autopsy showed that the heart was distended with fluid blood, save a small coagulum on the mitral and tricuspid valves. The vessels were engorged. This report justifies the belief that had tracheotomy been performed simultaneously with the injection and depletion, or, what amounts to the same thing, had the epiglottis been drawn forwards at the onset, life would have been restored. As it was, the artificial respiration was only effectually carried out some fourteen minutes after apparent death, and after the blood had been too diluted to perform satisfactorily its functions. In such a case, transfusion of blood might meet the difficulty.[3]

(To be concluded.)

CASE OF

LYMPHADENOSIS (HODGKIN'S DISEASE), WITH MULTIPLE GROWTHS FROM THE DURA MATER.

BY C. W. SUCKLING, M.D. LOND., M.R.C.P.,
PHYSICIAN TO THE QUEEN'S HOSPITAL, BIRMINGHAM.

J. O——, a man aged nineteen, was admitted into the Queen's Hospital on the 22nd of November last, complaining of pain in the head and giddiness. The patient said he had been ill for three weeks, suffering greatly from pain in the head; it was not constant, but the intermissions were very brief. The pain was always much worse at night, being chiefly localised at the back of the head. For the fortnight previous to admission he found that he saw things double unless he closed one eye. He had a good deal to do with lead in his work, being a galvaniser; he had never had syphilis and had not been a drinker. There was no family history of importance. Up to four days from the date of admission the patient was able to walk about, but he then had severe vertigo, everything appearing to move round him. On admission, the patient was found to be emaciated and markedly anæmic; the facial expression denoted pain. There was internal strabismus of the left eye and diplopia, showing paralysis of the left sixth nerve. He complained of severe pain in the head, especially at the back, and tenderness on percussion was found all over the skull. The lips and teeth were covered with sordes, the tongue being covered with a thick brown fur. There were anorexia and great thirst, with constipation. The glands in the neck and groin were observed to be very easily felt, but they were not much enlarged. The spleen and liver were also found to be enlarged. The reflexes were normal, sensation also was unaffected. The patient could scarcely stand, the gait being very staggering; but the staggering was not in any definite direction. The pupils were equal and responded normally, but were rather dilated. There was no optic neuritis or any morbid change in either fundus, but the veins were noted to be very large and tortuous.

[3] Vide infra, Experiment 15.

Nov. 28th.—The pain in the head is less in the morning, but the patient cannot sleep for it at night. The blood was examined, and the white corpuscles were found to be small and increased in number, but not to any considerable extent, certainly it was not leucocythæmic blood.—30th: At 12 P.M. the patient began to breathe rapidly; the temperature went up to 104°. Severe pain in the head was complained of. He became comatose, and died at 2 P.M. The temperature varied between 98° and 101° F. during the time he was under observation; the pulse was soft, dicrotous, and rapid throughout.

Autopsy.—Hypostasis and rigor mortis were slight. On removing the calvaria, the dura mater was seen, with a soft pulpy tissue of reddish colour, growing in scattered patches over the outer surface; these growths had eroded small corresponding cavities in the bone above. When the dura mater was stripped off the base of the skull, similar growths were found growing from the outer surface of the membrane; one growth, polypoid in form, projected into the lateral sinus of each side opposite the inferior angle of the parietal bone. Another growth filled the sphenoidal fissure of each side, embracing the nerves running through the foramen, thus accounting for the paralysis of the sixth nerve. The lungs and heart were normal; there was no enlargement of the thymus or of the lymphatic glands in the thorax. On opening the abdomen, the intestines were observed to be dotted all over with white spots as large as hemp-seed; these were the solitary glands. Peyer's patches were very large and distinct, and most plainly seen through the peritoneal coat of the intestine; the cæcum especially was covered with white spots thickly crowded together. On section of the patches no trace of caseation or congestion could be found; they were of a white colour. The mesenteric glands were as large as pigeons' eggs, pale and firm. The spleen weighed 24½ oz., was uniformly enlarged, dark-coloured, and soft. The Malpighian bodies were easily seen with the naked eye; they presented trabeculæ radiating from them in a stellate manner. The liver weighed 7 lb., was uniformly enlarged, the lobules being very large and pale; it was easily friable. The kidneys together weighed 10½ oz.; in the cortex of the left one there was a body composed of whitish firm tissue the size of an orange-pip.

The above case is exceedingly interesting and instructive. Growths from the dura mater are certainly rare in this disease, and the prominence of the cerebral symptoms with the very moderate enlargement of the lymphatic glands obscured the diagnosis. The following symptoms suggested the diagnosis of cerebral tumour: Vertigo, pain in the head, paralysis of the sixth nerve, diplopia, and staggering. The staggering was not in any definite direction, and did not enable us to totalise any mischief in the cerebellum, although the pain was very marked at the back of the head. The absence of optic neuritis is probably accounted for by the fact that the growths were on the outer surface of the dura mater, and had eroded cavities in the bone in which they lay; thus not encroaching to any extent upon the brain space. It was thought that the slight enlargement of the glands of the neck and the cerebral symptoms might be due to syphilis, and this was supported by the nocturnal exacerbations of the pain, which were very marked. But the patient positively denied having had a chancre, and iodide of potassium did no good. The enlargement of the spleen suggested leucocythæmia; and the blood was examined, showing only a slight increase in the number of the white corpuscles. The marked predominance of the cerebral symptoms and the absence of any considerable enlargement of the lymphatic glands led us away from the diagnosis of lymphadenosis. The disease in this case was manifested especially in the spleen, intestines, liver, and dura mater. Histologically the growths from the dura mater were of a lympho-sarcomatous structure, consisting of a delicate reticulum, the meshes of which were filled with leucocytes.

ROYAL SOUTH HANTS INFIRMARY.—The yearly meeting of the subscribers to this institution was held on the 27th ult., when the forty-sixth annual report was read. The number of in-patients treated during 1884 was 993, and of out-patients, exclusive of dental cases, 3017. The total income of the infirmary during the year was £4033, and the expenses amounted to £4227. A formal resolution, as brought forward for a year or two past, that the post of assistant house-surgeon be not filled for another twelve months, was carried, with one dissentient.

PERFORATING BULLET WOUND OF ABDOMEN.

NOTES OF THE CASE OF INSPECTOR SIMMONS, ESSEX COUNTY CONSTABULARY.

BY ALFRED WRIGHT, M.R.C.S., L.S.A.,
SURGEON K DIVISION METROPOLITAN POLICE.

THIS officer, whilst on duty, met three suspicious characters on the road three miles from Romford, and, thinking they were contemplating burglary (a surmise justified by the subsequent finding of burglarious implements, which the fellows threw away on being chased) challenged them, and was shot by one of the men at a distance of a few feet. The officer, struck by the ball in the abdomen, staggered but did not fall, and pluckily ran after the fellows for half a mile; and, though feeling faint, afterwards was able to walk to the nearest police-station, two miles farther on; an astonishing circumstance, considering the severity of the injuries. When first seen by me, at 7 P.M., about two hours after the receipt of the injury, there was not much shock, the countenance was not anxious, and the patient had not vomited. There was a small circular wound, evidently made by a bullet, two inches and a half below the umbilicus, and one inch and a half to the left of the median line. There had been but slight hæmorrhage. A catheter being passed drew off half a pint of clear urine. It was at this time hoped that the ball might possibly not have reached the abdominal cavity; for, though it could not be felt in the abdominal wall, it might easily be missed, as the patient was a stout and muscular subject, and of course the probe was but sparingly employed. One-third of a grain of hydrochlorate of morphia was administered hypodermically, hot bottles applied to the feet, the wound was closed by a piece of lint and collodion, and ice was given to suck to relieve thirst, which was great. During the night the doubt as to the intestine being injured was solved by the patient vomiting a large quantity of dark fluid, a specimen of which examined microscopically showed altered blood-corpuscles in abundance. Temperature 99°; pulse 100. The morphia was repeated during the night, but there was no sleep. The patient complained of severe thirst, a good deal of abdominal pain, and had vomited repeatedly and extensively.

Jan. 21st.—9 A.M.: A little tenderness round the wound; no general tenderness of abdomen. Temperature 99°; pulse 110. 1 P.M.: More vomiting of coffee-ground fluid; oozing of similar fluid and flatus from the wound. 8 P.M.: Seen by Mr. Sydney Jones. A counter-opening made an inch and a half below the wound, and a drainage-tube introduced, to allow the escape of fluid, which was beginning to bag in the abdominal wall. No more vomiting since the morning; abdomen slightly tender and tympanitic. Temperature 101·3°; pulse 115; spirits good. The patient was kept well under the influence of morphia injected subcutaneously, and nothing was allowed by the mouth except ice sparingly. 22nd: Restless night; tormented by intense thirst. Temperature 101·3°; pulse 120; respiration 52; more tympanites and more abdominal tenderness; no vomiting; a good deal of dark fluid (fæcal) discharge from the drainage-tube. 6 P.M.: Seen again by Mr. Jones. Condition much the same, but appears weaker. Linseed-meal poultice applied to the abdomen.—23rd: Slept fairly during the night. Temperature 101·3°; pulse 128, weaker; respiration 50. No vomiting. Four ounces of peptonised beef-tea with half an ounce of brandy were administered per rectum, morphia being continued hypodermically. 1 P.M.: The patient turned suddenly livid, with great dyspnœa and cold skin. Ordered brandy-and-water in quantities of a teaspoonful, and enema of beef-tea and brandy repeated. 6 P.M.: Says he feels better; circulation is restored, but the pulse (130) is evidently much weaker; temperature 101°; more tympanites and more general abdominal tenderness. Brand's essence of beef was given by the mouth. 11.30 P.M.: Pulse 138, very feeble; a good deal of abdominal pain; more tympanites; free discharge of flatus and fluid from the tube. Deposition taken.—24th: Gradually sinking during the night. The patient died at 11 A.M.

Autopsy, twenty-four hours after death.—Sanguineous oozing from nose and mouth; great distension of abdomen. Considerable extravasation in fascia and substance of abdominal muscles. Small circular wound through peritoneum; intense congestion of omentum and peritoneal covering of whole of small intestine. A good deal of soft lymph effused, but no extravasation in peritoneal cavity; small intestine uninjured. Wound a quarter of an inch in diameter in front of descending colon, eighteen inches from rectum, the wound being plugged by a fragment of clothing; a corresponding wound three inches lower down in posterior wall of gut. Much extravasation in areolar tissue between colon and sacrum, and in quadratus lumborum muscle; the bullet (weighing two drachms) sticking in centre of sacrum to the extent of a quarter of an inch. Lungs much congested posteriorly; other organs healthy.

Romford.

ABORTION, PHLEGMASIA DOLENS, AND SEPTICÆMIA.

BY E. L. DIXON, M.D., M.R.C.P.,
HONORARY MEDICAL OFFICER TO THE PRESTON AND COUNTY OF LANCASTER ROYAL INFIRMARY.

A SHOPKEEPER'S wife, aged thirty-six, was seen by me for the first time on Sept. 8th last. She had been married three years and a half, had had four abortions (before this), and no living child. When three months pregnant she, apparently from fright, was seized with uterine hæmorrhage, which had continued almost up to the time of my seeing her, but had then entirely ceased. Five days before, a solid substance of some size had been expelled, but had not been examined. Three days before, two or three small black fragments of the size of marbles, and of offensive smell, had also been passed. The day before she had been seized with shivering, and the left leg had begun to swell and be very painful. During one or two of her previous pregnancies it had also swollen. The leg from the hip to the toes was hot and much swollen, and pitted on pressure; the skin was very red in large patches below the knee; the veins about the hip were very marked; and the thigh in the course of the femoral was very tender but not hard. The uterus was slightly enlarged, and the os rather patulous; there was no offensive or other discharge. She had had alarming attacks of fainting during the day; the pulse was very rapid and the temperature high; there had also been retention of urine for many hours.

Sept. 14th.—She has continued very ill. One evening she had a violent rigor, and the temperature went up to 105·2°, and it has always been very high; the pulse has been rapid; there have been distressing vomiting and occasional profuse diarrhœa, and once or twice a mouthful of blood has been expectorated. She has been taking quinine in four-grain doses up to tinnitus aurium, when it was reduced to half the quantity. Hypodermic injections of morphia have been given to relieve pain and procure sleep, and also morphia and atropine pills, unless the purging was profuse, when the atropine was omitted. Her principal food has been iced milk, of which she has taken large quantities; alcohol in every shape has produced vomiting. A vulvar gland (of Bartholinus?) has become enlarged, hard, and painful. Once or twice there has been a very trifling discharge on the napkin applied to the vulva, which has been thought slightly offensive. The symptoms were so alarming that, although on passing my finger into the os I could feel nothing, and the end of it did not smell, I determined to thoroughly explore the uterine cavity, and for this purpose passed in a large sea-tangle tent.

15th.—I thought I reached something with the end of my finger in the uterus, which I washed out with carbolic lotion (1 in 20), afterwards introducing another tent.

The following day the cervix was found fully dilated, and (without an anæsthetic) I succeeded in hooking the finger over and withdrawing a foreign substance, which proved on examination to be a piece of putrid placenta about the size of a damson. Beyond its place of attachment the cavity wall of the uterus quite up to the fundus was perfectly smooth. A carbolic lotion (1 in 40) was now injected into the womb daily until the 19th, when the os had almost closed; there was no discharge of any kind, and the painful enlargement of the vulvar gland had disappeared.

The patient began rapidly to improve after the uterus had been emptied, the temperature fell, and in a week was

normal, and the pulse diminished in frequency. A state of gastro-enteric catarrh, as evidenced by a glazed tongue, vomiting of almost everything but iced milk, and occasional diarrhœa, continued, however, for some time. The right leg became also œdematous below the knee, but was not painful and was soon better. The swelling of the left leg also gradually disappeared.

The interesting point in this case is the retention of a small portion of decomposing placenta within the uterus with such trifling local indications of the existence of the source of infection. The patient was, however, the subject of septicæmia in a very alarming form; and, even at the risk of finding nothing, it seemed desirable to dilate and explore the uterus. This was done not a moment too soon; indeed, it had better have been done earlier, for the poisonous dose absorbed was quite sufficient to make the convalescence somewhat protracted. Bismuth with laudanum seemed most useful in combating the gastro-enterite.

Preston.

A Mirror
OF
HOSPITAL PRACTICE,
BRITISH AND FOREIGN.

Nulla autem est alia pro certo noscendi via, nisi quamplurimas at morborum et dissectionum historias, tum aliorum tum proprias collectas habere, et inter se comparare.—MORGAGNI *De Sed. et Caus. Morb.* lib. iv. Procemium.

GUY'S HOSPITAL.

EIGHT CASES OF CATARACT OPERATIONS IN AGED PATIENTS; CURE.

(Under the care of Mr. HIGGENS.)

THESE cases of cataract, all of which occurred in patients of the age of eighty or above, are instances of the successful performance of an important surgical operation at a period of life when the surgeon is, as a rule, unwilling to operate excepting for emergencies. Although the reparative power of the cornea is impaired before the age to which these patients had attained, still in properly selected subjects, as here recorded by Mr. Higgens, the operation of extraction may be most successful.

CASE 1.—Minto G——, aged eighty, was admitted on June 14th, 1875. Cataract in both eyes; left eye has been quite blind nine years. Extraction by oblique corneal section downwards, and removal of a small piece of iris performed in left eye.—July 17th: Vision = $\frac{1}{36}$ with + 3.

CASE 2.—Judith S——, aged eighty, was admitted on Oct. 9th, 1876. Cataract in both eyes; that in right eye most advanced. Extraction by small flap section downwards, associated with iridectomy, performed in right eye; no anæsthetic was administered.—Nov. 9th: Reads Snellen $2\frac{1}{2}$ with + $2\frac{1}{2}$. Vision = $\frac{1}{36}$ with + 3.

CASE 3.—Grace H——, aged eighty-two, was admitted on July 22nd, 1878. Cataract of both eyes; most advanced in left. Extraction by small flap section upwards, and iridectomy performed in left eye.—Aug. 26th: Reads Snellen 5 with + 16 D. Vision = $\frac{1}{6}$ with + 12 D.

CASE 4.—Esther A——, aged eighty-eight, was admitted on Oct. 20th, 1879. Mature cataract in both eyes; extraction by small flap upwards, and iridectomy in right eye.—Nov. 17th: Could tell the time on a watch with + 13 D.

CASE 5.—William B——, aged eighty-four, was admitted on June 7th, 1880. Cataract in both eyes; right worst. Extraction in right, small flap upwards, with iridectomy.—July 12th: Reads Snellen 1·25 with + 16 D. Vision = $\frac{1}{10}$ with + 13 D.

CASE 6.—Phœbe C——, aged eighty, was admitted on Oct. 22nd, 1883. Cataract in both eyes; extraction in left by small flap downwards, with iridectomy. Severe iritis supervened. On Dec. 10th the iritis had subsided, but the pupil was entirely blocked.—March 10th, 1884: A needle operation for opaque capsule performed.—24th: Reads J. 8 with + 16 D. Vision = $\frac{1}{12}$ with + 12 D.

CASE 7.—Lucy J——, aged eighty, was admitted on Jan. 21st, 1884. Cataract in both eyes. Extraction performed in both by small flap section upwards, with iridectomy.—Feb. 20th: Both eyes could tell the time on a watch with + 16 D.

CASE 8.—William T——, aged eighty, was admitted on Jan. 28th, 1884. Extraction by small flap upwards, and iridectomy in right eye.—Feb. 18th: Tells time on a watch with + 16 D.

ST. SAVIOUR'S INFIRMARY, NEWINGTON.

CASE OF SWORD SWALLOWING; DEATH FROM INJURY TO THE ŒSOPHAGUS; NECROPSY; REMARKS.

(Under the care of CHARLES GROSS, M.B., B.S.Lond., F.R.C.S., Medical Superintendent.)

THE interesting case which Mr. Gross describes is certainly most uncommon, there being few cases on record where the practice of sword swallowing has led to the death of the performer. Dr. Parkes described a case[1] where the man, aged twenty-three, passed the sword through the anterior wall of the œsophagus into the pericardium, the patient dying from acute pericarditis a few hours afterwards.

Reuben S——, aged thirty years, by trade a painter, was admitted into the infirmary on Jan. 17th, 1885. He stated he was in the habit of conjuring and sword swallowing in various public-houses. On Jan. 15th, two days before admission, he was performing at a public-house in Leather-lane, when on pushing a sword down his throat it hurt him far more than usual, and on withdrawing it he spat a little blood. Pain, with difficulty in swallowing, quickly came on, and feeling very ill and uncomfortable he was obliged to return to his lodgings. Becoming gradually worse, he procured admission to the infirmary. On admission he seemed very ill and in pain all over, but especially in the throat and down the gullet, much intensified in his efforts to swallow. The front of the neck was swollen and tender, the breathing shallow and hurried, and he kept spitting glairy mucus unstained with blood. There was nothing abnormal to be seen on looking down the throat. He was quite sensible and gave an account of the occurrence as above; he also stated that he thought the sword he had used on the last occasion had some roughness at its edge; that the performance always hurt him a little, and that he preferred to swallow a smooth whip-handle rather than a sword. He was put to bed, hot fomentations applied to the neck, and milk and fluid diet ordered. He became gradually worse, the neck swelled up more, pain and difficulty in swallowing increased; he eventually became delirious, and died suddenly at 7 P.M. on Jan. 20th, three days after admission.

Autopsy, seventy-two hours after death.—Body, that of a well-nourished, healthy-looking man, well covered with fat. No external marks of violence. Front of neck still somewhat swollen. The heart was large and flabby, and nearly empty. The lungs were slightly congested and œdematous; there was evidence of old pleurisy on the lower lobe of the left lung. The stomach was quite healthy and showed nothing abnormal. The œsophagus, from its commencement to within one inch from the stomach, was somewhat dilated, with its walls much thickened. Its mucous membrane was thickened, tough, and smooth, whitish in colour, resembling the internal coat of the aorta. The outermost coat and surrounding tissues were infiltrated with pus, constituting, in fact, a diffused abscess from the back of the pharynx to the diaphragm. There was no sign of any perforating wound, and only a slight patch of excoriation at the upper and posterior part. Below the bifurcation of the trachea the left vagus nerve ran through the abscess. The other organs, including the brain, were healthy, but full of blood.

Remarks.—The condition described was undoubtedly due to the irritation of the parts by the constant passage of a hard solid body, such as a sword or whip-handle, and had probably been coming on for some time; certainly longer than the five days between the last performance and his death. As he himself stated that lately it had pained him "more than usual," some slight inflammation most likely was set up some time ago, and gradually culminated in the formation of an abscess. The stomach was in no way affected. Probably the sword was not pushed so far, but stopped at the natural narrowing, where the gullet traverses the diaphragm. The immediate cause of death was syncope. I have not been able to procure, nor have I seen, the sword with which this man performed, but I have been favoured by a visit from two sword swallowers, who were attracted

[1] Trans. Path. Soc., 1848-49.

to me by reading the account of my patient's death in the newspapers, and who were anxious for an opinion as to the peculiar dangers to which they were exposed. The swords they use are 21½ in. long in the blade, 1¼ in. broad, tapering to 1 in., straight, heavy, thick, smooth, with well rounded edges and point, similar to those carried by the "pompiers" in Paris. The longest they perform with is 27 in. in length. For my edification they gave a demonstration of the feat. Straightening the passage by well elevating the chin, then putting the point of the sword well to the back of the throat, with one thrust they pushed it down as far as the hilt. With the shorter swords they could bend the body forward from the loins and withdraw the sword whilst in that position. They both acknowledged that they frequently hurt themselves, and one of them had been an in-patient at St. Thomas's Hospital in consequence of an injury to the œsophagus.

The man referred to was under the care of Mr. Francis Mason, and we are indebted to him for an account of the case. The patient, a man aged nineteen, was admitted on June 16th, and remained under treatment eleven days. Two days before admission he was performing in public, and had passed the sword down the œsophagus to within two inches from the hilt. He made signs to a bystander to pull it out, but, instead of doing so, he forced it down. The patient vomited two hours afterwards, and was obliged to go to bed, where he was only able to lie on the right side. When examined, he complained of great pain, referred mainly to the centre of the sternum and upper part of the abdomen. The pain was increased by attempts to swallow and by deep breathing; the abdomen was slightly tender, but not distended. Respiration 30; pulse 84.

June 18th.—There was no pain; he still lies on the right side. Respiration less painful; pulse 94.

20th.—Pulse 84; respiration 26.

21st.—Slight crepitation noticed at the left apex.

23rd.—Still complaining of pain, and there was occasional sensation of sickness and of heaviness after food. He was only allowed ice at first and then fluids, the diet being carefully regulated. The temperature on the evening of admission was 101·6°; on the following morning 101·2°; and for the next week there was a difference of from one to two degrees between the morning and evening temperatures, the highest evening temperature being 101·8° and the lowest morning temperature 99·4°.

In this case it would appear that there was injury to the mucous coat of the lower part of the œsophagus, and possibly to the stomach itself; whilst in the case under the care of Mr. Gross the mischief, as he says, appears to have commenced before the date of supposed injury.

WOLVERHAMPTON AND STAFFORDSHIRE GENERAL HOSPITAL.

MULTIPLE RENAL CALCULI AND PYO-NEPHROSIS; AUTOPSY; REMARKS.

(Under the care of Dr. MILLINGTON.)

FOR the notes of the following case we are indebted to Dr. Dingley:—

Calculi in the kidney usually give rise to so much pain and uneasiness during their formation that they are brought under the notice of the physician at an early period: pain referred to the region of the kidney, more or less constant in character and aggravated by exertion, with occasional hæmaturia, general impairment of health, &c., causing the patient to seek relief before they have reached a large size. It is most unusual for them to attain to such a large size and number, causing so great an amount of destruction of renal subtance as in this case, before producing symptoms of local disease.

Mary Anne R——, aged thirty-two, was admitted on Nov. 8th, 1884. She had been married twelve years and had had four healthy children, who were all living. Her mother was living and strong, but her father died in an asylum. The patient says she has been ailing for a year, gradually losing appetite and wasting, but has never had any pain till the last week. Three weeks ago she had an attack of vomiting, and about ten days ago noticed a swelling in her left side. On admission she was found to be very emaciated, weighing 6 st. 3 lb., and weak. Her skin had a pale and slightly earthy tint, it was also dry and harsh with long downy hairs on the back. Her tongue was dry and slightly furred, her appetite very bad, she did not vomit, and the bowels were open. At times she had attacks of pain in the abdomen. Upon examination a large rounded tumour was noticed in the left lumbar region, extending downwards and inwards, and measuring about 7 in. in length by 4 in. in breadth. It had a smooth soft feel, but no fluctuation could be felt. Something could be traced running over it from above downwards, which moved about and appeared to be the descending colon, but it did not alter the dulness of the tumour. The lower border of the swelling reached 1½ in. above the left anterior superior iliac spine, and extended across to the middle line. Above, the dulness extended to the seventh rib. In the right lumbar region there was another tumour similarly placed, measuring 5 in. in length and 3 in. in width, and extending obliquely downwards and inwards; but instead of the soft smooth feel of the other, it had a very irregular form and feel of stony hardness. It had a sharply rounded border, under which the fingers could be inserted. An irregular upper edge could be felt, and the tumour seemed to be entirely distinct from the liver. They were both fixed and not at all tender or painful, and over both absolute dulness was obtained. When the back was examined, on both sides there was absolute dulness reaching from the spine to the tumours in front. Vaginal examination showed that the uterus was normal and the pelvis free from disease. The chest was in a fairly healthy condition, but the pulse was very weak and small, and the cardiac sounds rather indistinct. The urine had a specific gravity of 1025; it was pale, but turbid, with a stringy deposit. It contained about one-eighth of pus, and, after boiling, about five-twelfths of albumen; but nothing but pus and epithelium cells could be detected microscopically.

During the first week that the patient was in the hospital the left tumour increased rapidly in size, and became distinctly fluctuating, and the question of aspiration was being discussed when severe paroxysms of pain set in, and lasted several hours, the patient being in agony until relieved by opiates. After the pain had become easier, it was found that the tumour on the left side was much smaller than when the patient was admitted, and it continued so to lessen that no prominence could be seen. At the same time the pus in the urine increased to one-half, and for some days large quantities were passed in this way. The patient was evidently getting weaker, and died from syncope on Nov. 23rd.

Autopsy.—When the abdomen was opened nothing abnormal was to be seen until the intestines were pushed back, when in the place of each kidney a large swelling was noticed. On closer examination, the one on the left side was found to be 8 in. long by 4 in. wide and 3 in. deep, and the renal vessels and ureter could be traced entering it, and the descending colon passing over it. When opened, it was found to be a thin-walled sac full of pus, the walls nowhere exceeding ¼ in. in thickness, and for the most part no thicker than the skin. After the pus had been removed the organ weighed nearly 10 oz. Its interior was divided by septa into four conical sacs, all communicating with each other at their apices and roughly representing the pyramids. In two of these sacs there were calculi from ½ in. to ¾ in. in diameter, whilst in the pelvis and commencement of the ureter there was another calculus, shaped like a very elongated cone, which completely blocked the lumen of the ureter when pushed down. No trace of ordinary kidney substance could be found. The right kidney was also much enlarged, measuring 7 in. in length by 4½ in. in breadth, by 3 in. in depth. Its hard irregular feel at once indicated that it was full of large calculi. It weighed, with the calculi, 18½ oz. When opened there was found to be a small, thin capsule of healthy kidney substance surrounding five large calculi; these were rounded and irregular with prominent bosses, and were so closely embedded in the renal substance that this had to be torn in some places to show them; the largest measured 5 in. in length and 2½ in. in its greatest diameter, and had three outstanding processes. The next was 3½ in. long and 2½ in. broad, and the other three were almost as large. In the pelvis another was found 2 in. long and ½ in. in diameter, being horn-shaped, and filling up the pelvis, and beginning of the ureter. The calculi on chemical examination were found to consist of carbonate of lime, mixed with a little fibrinous material; the lymphatic glands on both sides were much enlarged; the other organs both in the abdomen and thorax were healthy.

Remarks by Dr. DINGLEY.—The chief interest of this case lies in the fact that the physical signs and clinical characteristics were elucidated by the autopsy. The soft fluctuating tumour on the left side with pus in the urine pointed strongly to either pyonephrosis or perinephritic abscess, whilst the paroxysms of pain followed by diminution in the size of the tumour, accompanied by a corresponding increase in the amount of pus in the urine, pointed almost conclusively to the presence of a calculus. The diagnosis of the condition in the other kidney was not so clear, as the calculi were so embedded in the kidney substance that no grating or movement could be obtained; the position of the tumour, its fixity, and the presence of calculi in the other kidney were the most important indications. The most remarkable feature of the case is that with such an advanced morbid condition and calculi in both pelves the patient should, with the exception of the attack noted above, have escaped without any pain, and should only have had her attention aroused by noticing the tumour. It is also interesting as showing with what a small amount of secreting renal substance life can be maintained. Of course, in such an advanced state, active treatment was out of the question; but had the case come under observation earlier, it would be worthy of consideration as to whether, by a lumbar incision and free drainage, the patient's life might not have been prolonged.

Medical Societies.

PATHOLOGICAL SOCIETY OF LONDON.

Cancer in a Cirrhotic Liver and Adrenals, with Pigmentation of Skin and Viscera.—Atrophy of Adrenals with Addison's Disease.—Infiltrating Growth in Liver and Adrenals of an Infant.—Addison's Disease.—Myoneuroma of Pituitary Body.—Tumour of Pituitary Body.—Hypertrophic Cirrhosis and Congenital Disease of Kidneys.

AN ordinary meeting of this Society was held on Tuesday last, Dr. J. S. Bristowe, F.R.S., President, in the chair. Perhaps the chief interest of the evening centred in the specimens of tumours of the pituitary body; the long discussion which many anticipated on the subject of the relation of Addison's disease to the adrenals did not take place.

Dr. CARRINGTON showed specimens from a patient aged fifty-four, who for two months before admission into Guy's Hospital had been suffering from epigastric pain and growing weakness, which had become so great that he could hardly walk across the road. The skin was everywhere of a walnut-brown, except in the axilla; the mucous membranes were not stained. In the epigastrium was a tumour evidently connected with the liver. He gradually became more and more feeble, and died three weeks after admission. At the necropsy the body was well nourished, the lungs were of a deep-black colour and œdematous; the blood was fluid, and there were ecchymoses beneath the pericardium. The site of each adrenal body was occupied by a cyst the size of a large orange containing soft brown grumous blood-clot. The surrounding tissues were not infiltrated. The liver weighed sixty-two ounces, and was extremely cirrhotic; its colour, internally and externally, was black. Scattered thickly through the organ were nodules, looking like altered blood-clot; several were as large as a pullet's egg. The spleen weighed thirteen ounces, and was very black externally and internally. The case was worthy of note on account of the obscurity of its pathology; though the naked-eye appearances were of cancer of the adrenal organs, yet the microscopic examination had shown that the walls of the cysts consisted of normal suprarenal substance. The apparently secondary growths in the liver consisted of clumps of altered liver cells. The pigmentation of the skin and viscera showed either that cancer of the adrenal bodies could produce the pigmentation, or that the patient was the subject of malarial melanæmia. Microscopic examination did not, however, confirm this view.

Dr. COUPLAND exhibited a specimen of Atrophy of the Adrenals with Addison's Disease. It was obtained from the body of a man aged thirty-seven years at death. He had been under observation for four years. The symptoms began in 1879, and death took place in January, 1884. Attacks of vomiting, faintness, lassitude, and extreme debility were the symptoms of which the patient complained. The last attack of this sort appeared to have been brought on by excessive drinking—an unusual circumstance with the patient,—and ended in death. There was decided pigmentation of the skin, especially of the face, hands, axillæ, and groins, and slate-coloured patches on the lingual and buccal mucous membranes. The scrotum was pigmented, the penis less so, and the areolæ of the nipples not at all. At the autopsy some pellets of orange-coloured fat alone remained in the site of the right adrenal, and numerous nerves could be traced to this region from the semilunar ganglion. The left adrenal was thin, atrophied to about one-third of the normal size, though retaining somewhat of its normal shape. There was lymphoid infiltration of the gastric mucosa, and hyperplasia of the follicular and agminate glands of the intestine and of the splenic follicles. The body was well nourished and free from any tubercular deposit. Dr. Coupland referred to five similar cases where symptoms of Addison's disease were associated with absence or atrophy of the adrenals, three being recorded in the Society's Transactions for 1882 by Drs. Goodhart, Davy, and Eastes. He then mentioned the fact of the normal atrophic changes of the adrenals and their not unfrequent congenital absence or ill development, especially in association with defective cerebral development, and pointed out how cases like the present opened up the much-debated subject of the nature of Addison's disease. Reference was made to the results of Tizzoni's experiments,[1] and to Dr. McMunn's observations on the origin of the pigments of the adrenals.[2] The suggestion that disease of these bodies might account for all the symptoms of Addison's disease could not be sustained in face of the large body of facts showing that the adrenals may be destroyed by cancer, degeneration, or atrophy without such symptoms occurring. The alternative doctrine of the dependence of the symptoms upon a lesion of the abdominal sympathetic seemed the only possible one, but in order to harmonise it with such cases as the present one it required that the atrophic changes of the capsules should be a result of some primary derangement of the nerve centre.

Dr. BARLOW showed specimens of Atrophy of the Adrenals. Though there existed a state of extreme atrophy of the adrenals, the right one still retained the cocked-hat shape. Microscopic examination proved the nature of the atrophied tissue to be of supra-renal origin. The spleen was somewhat enlarged, and its capsule thickened; the left kidney presented a small bilobed tumour, situate in and puckering the cortex; it was tough and leathery, and of rounded shape; it had the typical characters of a gumma; no reaction was obtained with iodine. The specimen came from a female patient aged forty-two, who had typical signs of Addison's disease. The duration of the illness was ten months, during which the patient was pregnant, and gave birth to a stillborn child. He considered that the possible association of Addison's disease with syphilis had not been adequately discussed. He referred to a contribution by Baerensprung on disease of the adrenals in congenital syphilis, which appeared to be of the nature of miliary gummata so far as could be made out from the drawings and descriptions.

Dr. H. SAINSBURY related an ordinary case of Addison's Disease in a man aged fifty-one. The symptoms lasted for two years, and consisted of severe pains about the back and epigastrium, with attacks of vomiting, progressive asthenia, and pale bronzing of the skin. At the autopsy the costal pleura of the left side showed patches of pigment, and both lungs were darkly pigmented. Adhesions of the right pleura and of the peritoneum were present. The adrenals were converted into stony masses, but were not adherent to the kidneys. There were minute ecchymoses of the mucous membrane of the stomach. The connective tissue around the adrenals on the right side was specially dense. The caseous change was most marked in the left adrenal body. Microscopical examination of the semilunar ganglion showed a denser fibrous tissue than usually obtained in a healthy person of about the same age. No bacilli were found in the diseased tissues.

Dr. NORMAN DALTON showed specimens of Infiltrating Growth of the Adrenals and Liver. They were taken from the body of a male child aged six weeks. The abdomen

[1] Vide THE LANCET, vol. II., 1884, p. 559.
[2] Ibid., current volume, p. 169.

was large. A syphilitic history was obtained, and snuffles were present, but no rash. The subcutaneous veins were enlarged, and the umbilicus became œdematous towards the close of life. The liver weighed thirty-seven ounces and a half; was variegated in colour, having a basis of yellowish-brown, which was mottled with hæmorrhages. A tumour, the size of a hen's egg, was found in the position of the left adrenal body, and presented a similar appearance on section to that of the liver, though the hæmorrhages were somewhat larger. Under the microscope groups of leucocytes were to be seen bounded by a stroma of fibrous tissue, which may have originated either in an interlobular hepatitis or in a thickening of capillary walls. The growth in the suprarenal showed a peculiar finely granular, almost fibrillated, substance, which stained deeply with picro-carmine, and through which leucocytes were strewn in various arrangements. This granular structure was probably a degenerated reticulum of lymphoid tissue; the medullary portion only was affected, and there did not seem to have been any infiltration. There was a history of syphilis, but in all probability the conditions were allied to those met with in cases of leukæmia. A similar case had been recorded by Mr. R. W. Parker in the thirty-first volume of the Society's Transactions; there was no syphilitic history in that case.

Mr. J. A. P. PRICE of Reading showed a living specimen of (?) Addison's Disease. Of pigmentation there was none on the face or on the dorsum of the hands, and the peculiar mottling of a dirty-brown colour was confined to the trunk, thighs, and arms. There was no pigmentation of the mucous membranes. The pigmentation had been present for three years. A swelling of the abdomen was probably due to glandular enlargement, which certainly existed in the neck. There was a slightly increasing proptosis, and this fact, together with a rapid irregular action of the heart without murmur, pointed to the sympathetic nervous system as the cause of the affection.—Dr. ANGEL MONEY referred to a case of lympho-sarcoma of the left adrenal body, in which there was great development of the external genitals with growth of large hairs on the mons veneris. The child was about one year old. The liver and lungs were apparently secondarily affected. He said that Dr. Dickinson had described a similar case in an early number of the Pathological Transactions.—Dr. HALE WHITE had examined some hundreds of specimens of semilunar ganglia, and thought that Dr. Sainsbury's specimens were not abnormal.

Dr. HALE WHITE exhibited a specimen of Myoneuroma of the Pituitary Body. It was taken from a boy who died from inflammation of the meninges, apparently caused by the tumour. Microscopic examination showed that it consisted largely of striped muscle; the fibres were, as a rule, well-formed, but had here and there undergone atrophy. At one part of the section a small body about the size of a pin's head was seen. This was exactly like a sympathetic ganglion, having a fibrous sheath and several ganglionic nerve cells lying embedded in a fibrous ground-work. There was a clear space around each nerve cell, which was multipolar and nucleated. In the same part of the tumour were several bundles of white nerve fibres, some of which had undergone degeneration. Fibrous tissue containing fat bound together these nervous and muscular elements. The tumour was the size of a large hazel nut; it implicated the optic chiasma; there was extreme atrophy of the optic nerves. New growths of the pituitary body are not excessively rare, but one like this has not been previously described, the nearest approach to it being a tumour of the pineal gland containing several cysts lined by epithelium, the tissue between the cysts containing hair, sebaceous glands, fat, hyaline cartilage, smooth muscle, and nerve. Was this new growth in the pituitary body due to an included mass, or was it developed from the posterior lobe of the pituitary body, which in the lower animals remained connected with the brain more closely than in man?

Mr. BOWLBY showed specimens of a Tumour of the Pituitary Body taken from a man aged twenty-two, who had had fits ten years and headaches; he died in a semi-comatose condition. The tumour was situated at the site of the pituitary body, and consisted of a bony part the size of a large walnut, which was not closely attached to the base of the skull, and of a softer mass containing cysts filled with soft sabulous matter. The bloodvessels were very numerous, and there were masses of epithelial cells growing into the tumour. There was some true bone, and this feature, together with that of the included portion of epithelial cells, closely resembled those of the specimens shown to the Society by Mr. George Lawson. The origin of the tumour was probably to be explained on the supposition that an inclusion of more epithelial tissue than usual took place in the developmental process by which the pituitary gland made its apppearance.—Mr. J. BLAND SUTTON referred to some facts in the anatomy of the nervous system of the snail, showing how the gullet passed through the nervous ganglionic ring at the cephalic extremity. He then spoke of the facts in the development of the pituitary body, which was largely composed of a nipped-off portion of the epiblast at the extreme cephalic end of what was the pharynx in the human body. A vertical section of the basi-sphenoid region of a fœtus of the seventh month showed a piece of connective tissue connecting the pituitary body with the superior constrictor muscle of the pharynx. In Dr. Hale White's case it was probable that the upper part of the pharynx had been cut off during development lower down than usual, and this would explain the presence of striped muscle fibre in the tumour, which was really a member of the class of tumours designated by the term "teratomata."

Mr. BRUCE CLARK showed a recent specimen of Primary Carcinoma of the Prostate and Base of the Bladder, taken from a man aged fifty-one, who had complained of difficulty of micturition for six weeks. A No. 19 French catheter was easily passed and the urine drawn off. The prostate could be felt per rectum much enlarged and firmly fixed. The urine was drawn off for the remainder of the patient's life; it contained blood and albumen, and had a specific gravity of 1012. Cystotomy was ultimately performed, and a piece of the growth was removed for examination. The temperature varied from time to time, and the case terminated in sudden death just after the appearance of hemiplegia and coma. At the autopsy an abscess was found at the base of the brain, and abscesses were present in the psoas muscle and lungs.

Dr. HALE WHITE showed a recent specimen of Hypertrophic Cirrhosis in a child aged nine years, who died from lobar pneumonia. The kidneys presented a shrivelled lobulated condition, probably congenital.—Dr. WICKHAM LEGG asked whether the other organs had been examined, and whether the temperature were raised. A case under his care presented the febrile chart of typhoid fever, and delirium with diarrhœa was also present. Cirrhosis was known to occur in early life in which other organs, as the heart and kidneys, were also cirrhosed. These facts tended to show that cirrhosis was not so much a local disease of the liver as a general one of the whole system.—Dr. HALE WHITE, in reply, said that he supposed the temperature was raised, as the lungs were in a state of red hepatisation.

The following card specimens were exhibited:—Dr. Coupland: Cases of Addison's Disease. Dr. Goodhart: Tumour of the Pituitary Body in a Baboon. Mr. D'Arcy Power: Knee-Joint seventeen months after Ogston's operation. Dr. Hadden: (1) Misplaced Kidney, with Short Ureter; (2) Puff-dart in Trachea; (3) Detachment of Peritoneal Coat of small Intestine, from Injury without Rupture of the Bowel. Dr. Hale White: A Calculus composed of almost pure Triple Phosphate.

HARVEIAN SOCIETY OF LONDON.

ON Thursday, the 15th ult., the annual meeting and conversazione was held in the Stafford Rooms, Tichborne-street. The Council, in its report, had to deplore the death of five members of the Society, but gave a very favourable account of the Society's financial and numerical condition. Valuable work had been done during the past year, and for the remainder of the present session many interesting communications were announced. Votes of thanks were given, on the motion of Mr. W. Adams and Mr. Cripps Lawrence, to the Council; of Dr. Meadows and Dr. Silcox, to the Treasurer; and of Dr. Symes Thompson and Dr. Davson, to the President. In his address the retiring President, Mr. G. P. Field, alluded to the recent history and to the prospects of the Society, and to the sad losses it had experienced during the year; and acknowledged with satisfaction the result of the general appeal made in favour of the widow and orphans of one of the Society's most distinguished members, the lamented Dr. Mahomed. The subject selected for the address was the progress of medical

science during the period which had elapsed since the foundation of the Society in 1831. The vast improvements and the marvellous discoveries belonging to that period were reviewed in decades. The germ theory of disease, now in the ascendant, was chosen as an illustration of the remarkable oscillations to which medical opinion is liable. Medical literature, medical legislation, and medical ethics were included in the survey of recent advances. Honours were slow to reward the labours of the profession; they had not exceeded an average of a title and a half each year. But while the healing art was not represented in the House of Lords, "Poetry and Porter had equally secured Peerages." The address concluded with remarks on the desirability and practicability of founding a teaching university in London. The thanks of the meeting for Mr. Field's valuable address having been carried by acclamation, the President announced that the officers proposed by the Council had been duly elected. Dr. T. Morton, the new President, then took the chair, and declared the conversazione open.

The following names are those of the officers elected for the ensuing year. An asterisk is prefixed to the names of those gentlemen who did not hold the same office during the preceding year:—President: Dr. T. Morton. Vice-Presidents: Dr. Ferrier, *Mr. Malcolm Morris, Dr. J. H. Staples, *Mr. Charles Vasey. Treasurer: Dr. T. Buzzard. Hon. Secretaries: Mr. J. E. Lane, Dr. Wm. Ewart. Council: Mr. Bryant, Dr. Cavafy, Mr. H. E. Juler, Dr. Symes Thompson, Dr. Dunbar Walker, *Mr. G. P. Field, *Mr. F. Otley Lovell, *Dr. Kirkpatrick Picard, *Mr. W. H. Platt, *Mr. H. Power, *Dr. Gilbart Smith, *Dr. John Williams.

The conversazione was enlivened by musical performances and the display of numerous objects of scientific, artistic, and historical interest.

MEDICAL OFFICERS OF HEALTH SOCIETY.

Small-pox Hospitals, their Influence on Surrounding Populations.

AT a meeting of this Society, held on Jan. 16th, at Adam-street, Adelphi, Dr. T. O. Dudfield, President, in the chair,

Drs. E. T. WILSON, GWYNN, and TRIPE each read a paper on the Influence of Small-pox Hospitals on Surrounding Populations. The following are abstracts of the papers:—

Dr. WILSON said that the occasional spread of small-pox in the immediate neighbourhood of small-pox hospitals in the metropolis seems to be an acknowledged fact; at the same time it is clear, from Dr. Thorne Thorne's exhaustive inquiry, that no such extension of the disease has ever been known to take place in even the largest provincial towns. How is a difference so remarkable to be explained? Are the ordinary channels of small-pox spread, acting under the altered conditions of a dense population, sufficient to account for the facts, or are we driven to seek for some altogether new factor, peculiar, it may be, to the metropolitan area? The answer is important, as on it would seem to hang the very existence of isolation hospitals for small-pox in London even in their present modified form. Those who hold that no new element has been introduced would point to the exceptional facilities which have existed up to a very recent period, perhaps exist even now, for the extension of small-pox around the isolation hospitals: defects of site and of construction; ingoings and outgoings with but slight precautions; abuse of the ambulance system; convergence of friends upon the hospital, and of patients who often walk through the streets; surroundings generally of the poorest; cases treated at home or concealed;—these and other causes too numerous to mention are, it is maintained, sufficient to account for any undue spread of the disease in the neighbourhood of small-pox hospitals. There are others, however—notably Mr. Power, Dr. Tripe, and Dr. Gwynn—who have felt themselves compelled to the conclusion that, whatever may be the case elsewhere, in London the infectious matter from small-pox hospitals is carried through the air for distances of a mile or a mile and a half. The evidence for this remarkable theory, first propounded by Mr. Power in 1881, rests on statistics chiefly, and on facts which certainly admit of more than one interpretation. Much stress is laid, for instance, on a graduated intensity in the number of houses invaded round small-pox hospitals, although in some cases the houses and population have been so varied in character as to render any comparison between districts useless, and in others the intensity has resulted from a convergence of disease commencing at a distance, and not from any divergence springing from the hospital as a centre. Again, whilst Mr. Power holds that the spread takes place at the commencement of an epidemic only, when acute cases begin to accumulate in a hospital and atmospheric conditions are favourable (these being a still, foggy air, deficient in ozone), others contend that the spread is noticed towards the close of an epidemic—under atmospheric conditions very varying, sometimes in the direction of the wind, sometimes in its teeth,—and apparently in entire independence of the number of acute cases at the time in the hospital. Such contradictions cannot but give rise to the suspicion that neither the atmosphere nor the numbers in hospital are concerned in the spread round these buildings, especially when it is found that the waves of intensity during an epidemic period are synchronous to a very remarkable extent around the various small-pox hospitals and in the metropolis as a whole; that, moreover, whole streets and buildings with susceptible individuals, in the closest vicinity to small-pox hospitals, often enjoy an immunity from the disease quite unaccountable on any theory of distal aerial spread of the infection. The distribution of cases also in both time and space, especially in Mr. Power's investigation, points to some causes acting continuously within the district rather than to any emanation from the hospital itself. On these grounds, and in view of the known causes of small-pox spread, giving rise to thirty or even fifty cases from a single one, it is contended that there is no need of a hypothetical aerial spread of infection to account for cases whose origin cannot be traced; and that a small-pox hospital *per se*, and independently of its operations and intercourse with the neighbourhood, is not necessarily a danger to the surrounding population.

Dr. EDMUND GWYNN read a paper dealing with the question, Could a small-pox hospital limited to thirty or forty beds be maintained in a crowded neighbourhood without danger to the surrounding inhabitants? Abundant proof had accumulated that in former epidemics small-pox had increased greatly in the neighbourhood of large hospitals. In Hampstead all the houses lying between the hospital and Haverstock-hill in the epidemic of 1872 were attacked, and in the epidemic of 1877 there was a great concentration of disease in houses adjoining the hospital. But in the epidemic of 1881, when the hospital was closed, the houses and streets in the vicinity were almost entirely free from small-pox. The Hampstead Hospital was again opened for small-pox cases on April 6th, 1884, the largest number of admissions in any week being 44, and in some weeks the numbers in hospital fell to 7 and 5. Three or four weeks after the opening of the hospital a large increase in the number of cases in Hampstead occurred; the houses near the hospital were not the first attacked, the chief outbreak being in the district of Belsize. These latter houses were distant from the hospital from one quarter to half a mile, and during the period they would receive their infection the wind blew steadily from the direction of the hospital on to them. After the first week in June the number of houses invaded within a quarter-mile circle from the hospital continued to rise steadily in proportion to the other houses in the parish, until at the end of eight months out of 310 houses in the special area 62 had been attacked, against 134 out of a total of 6870 houses contained in all the parish. In the epidemic of 1881 the special area, containing 207 houses, contributed only four, against 36 in all the parish. Thus with the hospital open the incidence on houses in the special area had increased to 20·9 from 1·5 with the hospital closed. A similar area taken around the workhouse showed only an increase of 1·5 over ·57. The death-rate from small-pox per 1000 deaths had risen from 2·1 in 1881 to 15·3 in the present case. The author asked, if the explanations offered to account for the spread of disease in the neighbourhood of the hospital by concealed cases, by overcrowding, by the natural march of the epidemic from east to west or south to north, are to be accepted as satisfactory when the hospital was open, why did the disease almost absent itself from this particular quarter during a severe epidemic when the hospital was closed? The entrance to the hospital was formerly on the west side, yet disease in former epidemics concentrated itself on the east side, where ambulances only come to remove cases by reason of a barrier erected in Fleet-road. In the present case the barrier had been removed and the entrance was now in Fleet-road, yet the disease first appeared on the west side. There appeared to be little spread of disease on the line of sewer above the

hospital. The author believed the danger from the hospital to arise from its action being continuous, whereas local outbreaks in other quarters could be effectually dealt with by disinfection and removal of cases.

Dr. TRIPE began his paper by stating that if it be admitted that the infectious matter of small-pox can infect at a distance, say, of twenty yards—and this is allowed by most authorities,—he could not understand why, under favourable circumstances, it could not infect at a greater distance, especially as no one assumed that the poison could be destroyed in a few minutes. He then referred to the great difficulty in ascertaining the precise source of infection in most cases, and therefore of assigning aerial infection as a means by which the disease is spread. This is especially the case as regards the Homerton hospital, where the visitors and tradespeople going to the small-pox and fever hospitals enter and come out by the same gate, and where the wards are much too near the street. After describing the position of the hospital as regards the streets and open country, he brought forward statistics to show how that in all the epidemics since that of 1870-71 the inhabitants of the streets near the hospital had suffered far more than those at a distance from it; that the high rate diminished as the distance from the hospital increased, and that although other outbreaks nearly as severe had from time to time occurred in other parts of the district, yet they had not occurred in every epidemic, as was the case with the streets near the hospital. As regards the proposition that the disease is spread by aerial infection, Dr. Tripe stated that in March, 1884, an outbreak of sixty-seven cases in six days occurred in a part of the district (to the south-west of the hospital), where there had been but two cases a fortnight before, and where it was in his opinion impossible that the disease could have been caused by the so-called ordinary modes of infection. In this instance the wind veered three times all round the compass from south-west, and blew on each occasion for some time east-north-east or north-east from the hospital. There was almost a calm on two occasions, and the air was unusually moist for March. Dr. Tripe again expressed his belief, which he had stated before the Royal Commission on Hospitals for Infectious Diseases, that the infection may be carried over a high building, and he gave what he considered reasonable proof of this assumption.

In the discussion which followed the reading of the three papers, the President, Drs. Gibbon, Iliff, Pringle, and others took part.

ACADEMY OF MEDICINE IN IRELAND.

A MEETING of the Medical Section was held on Dec. 19th, the President, Dr. Cruise, in the chair.

Dr. WALTER SMITH read a paper on the Nature and Treatment of Lupus. He found the frequency of occurrence of lupus in Ireland (Dublin) to be about 1 in 200 cases of skin disease. In England and Scotland the proportion is about one in fifty. He drew attention to the differential diagnosis of lupus, but he dealt chiefly with the arguments in favour of the doctrine that lupus is a branch of the tuberculous stock and is produced by an organised pathogenic virus. These arguments are derived from three sources—viz.: (1) clinical, (2) histological, (3) experimental. Viewed clinically, numerous skilled observers in England, France, and Germany recognise the points of contact between scrofula and lupus, and note the frequent coincidence of cheesy affections of the glands and joints with lupus. In 1883 among thirty-eight patients under M. Besnier's treatment for lupus in St. Louis, eight presented well-marked physical signs of phthisis. Histologically, the close resemblance between a caseating miliary tubercle and a lupus nodule had been often pointed out, and quite recently Dr. R. Koch had furnished decisive proof. He examined seven cases of lupus: in four, excised bits of skin; in three, scrapings of the lupus tissue. He found tubercle bacilli in all the four excised bits, but never more than a single bacillus in a giant cell. Experimentally, both culture and inoculation experiments had yielded positive results. As to the treatment, it was pointed out that if the tuberculous doctrine of lupus be accepted, it strengthens the position of those who advocate constitutional treatment, and especially anti-strumous remedies. The different plans for dealing locally with the lupus neoplasm were referred to, particularly the methods of linear scarification and of erasion.—Dr. HENRY KENNEDY said he had in his practice combined constitutional with local treatment, and of thermal applications he had used plain hot water, as hot as the patient could bear. In one case he established an issue in the patient's arm, which had the effect of keeping her face well for six years. All that time she wore the issue. Cod-liver oil was one of the best constitutional remedies. It was remarkable, as showing the constitutional history of the cases, that the moment the health became impaired the disease reproduced itself. He had used blistering with good effect.—Dr. ARTHUR BENSON alluded to some experiments made on rabbits by introducing pieces of living granulations, taken from the conjunctiva of a child suffering from lupus, into the eyes of the animals. One rabbit died after a week from hæmorrhage into the stomach. The eye was examined and found healthy. In the eye of the other rabbit there soon appeared patches of tissue of a yellowish colour with a pinkish appearance, very similar to what is recognised as tuberculosis of the cornea. After three weeks this animal succumbed to chloroform, and sections made from the enucleated eye by Dr. Abraham exhibited tuberculosis of the cornea and iris. Almost all the patients he had seen with lupus of the conjunctiva showed a marked tubercular tendency, but without lupus appearing elsewhere in the body.—Dr. DOYLE said when he was a student lupus seemed to be a prevalent disease; but he had reason to think that in a number of the cases eczema had been mistaken for lupus.—Dr. CORLEY was not so sure of the bacillary theory in this disease as some recent writers on the subject appeared to be. Having had large experience in the treatment of lupus, he had tried several remedies—red iodide of mercury amongst others; but latterly he had chiefly employed the method of scraping with Volkmann's spoon, which he thought gave the best results. Still some of these cases returned after two or three months, when he had to repeat the scraping, the disease having reappeared. Undoubtedly, constitutional treatment, especially by cod-liver oil, was of great value in some cases.—Dr. FINNEY said his treatment was chiefly scooping combined with linear incision. The cases in which he adopted scooping were those where the lupus was in the tuberculated form, and not where it had formed large thick crusts. Thus, where the tubercle was disseminated with a certain amount of skin between the patches, a good cicatrix might be anticipated. If a portion of skin apparently healthy, but not really so, was left without being touched with the nitrate of mercury, lupus nodules developed again. In many cases the return of disease was due to the inefficiency, rather than the inutility, of the treatment. The intense pain caused by exposure to cold wind in some of his cases was relieved by the scraping process and linear incision and burning out every spot with nitrate of mercury.—Dr. ROBERT M'DONNELL related the particulars of a case in which various remedies, including arsenic, had been tried, without having given permanent relief, until eventually the patient was cured by the free use of cod-liver oil internally: but she died some years afterwards from phthisis, showing the tubercular character of the disease in this case. Whilst a student in Paris, under Cazenave, he had paid a good deal of attention to the disease. Cazenave observed a case of lupus of the face, which became attacked by erysipelas, and, although fearing this complication would make the disease a great deal worse, to his surprise, when it passed away the patient got rapidly well. Effects of this kind suggested the use of counter-irritants to imitate erysipelas; and Cazenave, after using a number of irritants for the purpose, gave preference to red iodide of mercury ointment; but, beyond comparison, the greatest improvement of the time in the treatment of the malady was the scraping with the spoon and then rubbing the raw surface with a rough sponge. He had used this method a great many times, and had never been disappointed. There was a form of lupus in which, if arsenic was given at all, it should be in such doses as would produce poisonous symptoms, to act as mercury does where it was intended to produce marked salivation. It produced rapid improvement, but he could not say that a permanent cure was always effected.—Dr. WALTER SMITH, in reply, said the diagnosis of superficial lupus of the ear from eczema was shown by a loss of tissue when the crust was removed. So far as he knew, the bacillus was only found in tuberculous and scrofulous affections, and not in large ulcers, and therefore it could not be introduced from without. Lupus on a single surface like the cheek seldom ulcerated deeply; but when it attacked the nose it acted on both surfaces, and

thus caused great destruction of tissue. He could hardly lay down a specific rule as to which cases were most suitable for scraping. Spots of lupus too small to be scraped he treated by drilling with a pointed piece of wood tipped with nitrate of mercury.

LEEDS AND WEST RIDING MEDICO-CHIRURGICAL SOCIETY.

AT the meeting held on January 9th, Dr. Bell, President, in the chair, after the exhibition of several pathological specimens,—

Dr. JAMES BRAITHWAITE related a case of Fibroid Tumour (Sessile) in the Anterior Wall of the Uterus. This was removed from the peritoneal surface of the uterus by enucleation, and a large abscess was opened into the capsule of the tumour. The abdominal wound was closed, but free drainage was provided for by the capsule being stitched to the lower angle of the wound. The patient was in a very bad condition at the time, having been tapped for ascites repeatedly; and she died within twelve hours from cardiac thrombosis.—Professor JESSOP remarked that his experience of the removal of uterine myoma by abdominal section was limited to three cases. In 1865 he performed hysterectomy by the extra-peritoneal method in a case of very large multiple myoma, and the patient died after the removal of the clamp on the sixth day. A few years later he operated in a similar case by the intra-peritoneal method, and the patient died in the course of a few hours. A few weeks ago he operated by enucleation in a case in which the tumour weighed between 4 and 5 lb. He found some difficulty in stripping the tumour of its cyst; but there was not much hæmorrhage. In dealing with the cyst he inverted its edges so as to bring the serous surfaces in contact to the extent of about the upper five-sixths, and stitched the margins at the lower end to the abdominal wall for drainage. The patient is now convalescent, and Mr. Jessop hopes to bring her for inspection on a future occasion.—Mr. C. G. WHEELHOUSE mentioned two cases of abscesses in the uterine walls, one of which opened primarily into the bladder, the other directly into the uterine cavity, and both of which, the former by mechanical dilatation of the urethra and the latter by dilatation of the uterine cervix, were reached, cleansed, drained, and cured.

Dr. HELLIER read some notes of a case of Hysterical Ischuria in the case of a young lady aged fifteen, in whom for a period of nearly seven weeks there was marked scantiness of urine, interspersed with periods of complete suppression. On two occasions there was no secretion for forty-eight hours, and once, it was asserted, no urine was passed for five days. The case was associated with severe attacks of gastralgia, with obstinate constipation and menstrual irregularity, but there was little vomiting and no uræmic symptoms. After considering the possibility of fraud, Dr. Hellier discussed the reasons which led him to employ the somewhat unsatisfactory term "hysterical," criticised some of the common definitions of the word, but pointed out that it must be retained for the present because of its very practical meaning in (1) diagnosis, (2) prognosis, (3) treatment, with special reference to the employment of moral means of cure.

Mr. MAYO ROBSON showed a patient who had sustained an extensive laceration of the arm, leaving a large gap seven inches long by three wide in front of and above and below the right elbow-joint, exposing the brachial artery. After a sharp attack of secondary hæmorrhage on the fifth day from ulceration into the brachial artery, which necessitated its ligation, healthy granulations covered the wound, and on the sixteenth day after the accident a large flap of skin with its base below was reflected from the thorax and placed directly on the granulating surface, being left attached by a pedicle two and a half inches wide, which was separated on the twelfth day. The flap had nearly all lived, and the patient had now a sound right arm with every movement perfect. The points of interest in the case were:—(1) The transplanting of the flap directly on to granulations, and not on a refreshed surface; (2) the question as to whether or not the brachial should have been ligatured at first, thus saving the patient the danger of death from sudden rupture. Bearing on this point, Mr. Robson had seen a wound heal without hæmorrhage, in which the carotid artery was not only exposed, but even notched.—Dr. BARRS pointed out the little tendency blood-vessels have to participate in pathological changes going on in their vicinity, so long as the blood stream through them is uninterrupted.—Professor JESSOP related several cases where he had successfully transplanted flaps on to granulating surfaces.—Mr. Wheelhouse and Mr. Ward spoke, and Mr. Robson replied.

Mr. W. H. BROWN related a case where two months after Amputation of a Stiff Index-finger following Whitlow the stump became so tender that the patient begged to have it removed, which was done. The removed portion was examined by Dr. Griffith, who reported that there were two small fibrous nodules situated in depressions at the end of the bone. These consisted of nerve-fibres embedded in fibrous tissue.—Professor JESSOP related a case in many respects like the above in which amputation of the finger failed to relieve, but after years of suffering the neuralgia spontaneously disappeared.

Dr. CHURTON read notes of a case of Syphilis very early affecting the nervous system, and showed the patient, a man aged twenty-four years, strong but of dissolute habits, who had had a chancre four months ago. Two months after this he had sensory disorders in his right foot, spreading to the whole limb, and shortly after to the left foot and limb; he staggered in walking. A month later the hands became affected; he could not cut his food or pick up a match; he could not distinguish any object with accuracy by the sense of touch. When admitted into the Leeds Infirmary he seemed dazed and gave varying replies; he could not walk at all nor stand alone, even with his eyes open and anxiously watching his legs. The plantar and patellar reflexes were absent; simple muscular power somewhat feeble, no special wasting of muscles. Under treatment by mercurial inunction, rest, and abstinence from alcohol, the patient had in three weeks so much improved that only slight symptoms of ataxy remained.

Mr. MAYO ROBSON showed a girl, aged sixteen, from whom he had removed, on Dec. 10th, the sac of a Spina Bifida the size of a fœtal head, on account of severe brain symptoms, apparently due to inflammation of the sac, great increase of fluid, and pressure on the nervous centres. The patient was in good health, and presented only a cicatrix over the site of the tumour. He drew attention to: (1) Simple tension, raising temperature; (2) suppuration set up by tension, and not necessarily by septicity; (3) the new departure in the treatment of such cases; and (4) the excellent result of the operation, which undoubtedly saved the life of the patient.—Dr. Eddison, Mr. M'Gill, and Professor Jessop joined in the discussion.

Reviews and Notices of Books.

Scientific Papers and Addresses. By GEORGE ROLLESTON, M.D., F.R.S., &c. Arranged and Edited by WILLIAM TURNER, F.R.S.; with a Biographical Sketch by EDWARD B. TYLOR. Two Volumes. Oxford: Clarendon Press. 1884.

WE have experienced great pleasure in reading these memorials of a very active, vigorous, and independent worker and thinker. The subjects of which they treat are multifarious, and all as he treats them are rendered interesting. Whether we open the volume at the chapters devoted to the series of prehistoric crania which he with Canon Greenwell took such pains to unearth and describe, at that in which he discusses the origin of the domestic pig, at the place where he inquires into the cause of the rot in sheep, where he so nearly gave a correct solution in naming the black slug instead of the Limnæus since shown by Lewis to be the real delinquent, or at some other of the numerous essays contained in these volumes, we cannot fail to be struck at the amazing extent of Dr. Rolleston's knowledge, the facility with which he adduces and arranges facts, and the caution with which he draws inferences from them. Rolleston was indeed a brilliant man. His memory was singularly tenacious and his powers of work extraordinary. In fact, his too early death may be in great part attributable

the increasing demands he made upon his mental and to bodily powers. *Apropos* of this, we once heard him tell the following anecdote. He had been, as was his custom, hard at work in the museum, and was returning home, when a stranger accosted him with, "Ah, Professor Rolleston, I am glad to have met you, for I find I have half an hour to spare, and I should be so much obliged to you if you would show me over the mus——" "You have found a spare half hour," interrupted Rolleston; "for God's sake give it to me; I have been looking for it all day."

The work is introduced by a charming biographical sketch by his friend Edward B. Tylor, the present Reader in Anthropology, in which such details of his early life as are known, and many extracts from his letters, are given. Rolleston was born in 1829, and whilst very young was devoted to natural history; at the age of six setting traps in the grounds of his father, and dissecting mice and weasels. Not less significant of his future, Mr. Tylor observes, was his setting up heaps of stones to record the death of a favourite animal, or other event. A boy who at eight years old piled up in the plantation a memorial cairn to commemorate his sister's recovery from scarlatina was well started on the line for an explorer of ancient burial-grounds. Early imbued with a sound knowledge of Latin and Greek by his father, at the age of twenty-one he took a first-class in classics, and next year was elected a Fellow of Pembroke. The Fellowship was a medical one, and naturally determined him to take to medicine as a profession. He entered at St. Bartholomew's Hospital, and worked there long and hard. The outbreak of the Russian war led to his departure for Smyrna, and to his doing duty in the general hospital. At the close of that war he returned to Oxford, and was soon appointed to the Linacre Professorship of Anatomy and Physiology (1860). In 1861 he married Grace, daughter of Dr. John Davy and niece of Sir Humphry Davy, by whom he had seven children. He died from renal disease in 1881. Though never lecturing to large classes, he worked at each lecture with untiring assiduity. He made many warm friends amongst his pupils, and he was proud and pleased to say that they never forgot their old master; from them he was constantly receiving specimens, which, whilst they filled the shelves of the museum, told him that the lessons he had taught were bearing fruit, and that he was affectionately remembered by men who were separated from him by many years of time and by half the circumference of the earth. Professor Turner has collected no less than seventy-nine memoirs and addresses, which have been published, to which are added three hitherto unpublished notes. There is not one of these which is not interesting, and which, if it have been already read, will not bear a second perusal; not one that is not illustrated by his varied learning and accurate powers of observation. A large number of them are anthropological, deal with the contents of barrows, and give an account of researches and excavations in various parts of the country; others deal with zoological subjects; the majority are, however, occupied with points of anatomy and physiology, on which he was constantly engaged. He leaves a brilliant name to his children. We can wish them nothing better than that they should emulate his earnest and useful life.

London and Provincial Water-supplies, with the latest Statistics of Metropolitan and Provincial Waterworks. By ARTHUR SILVERTHORNE, Assoc. M. Inst. C.E., Consulting Engineer. London: Crosby Lockwood and Co. 1884.

THIS is a carefully compiled and most valuable statistical account of the water-supply of London and about eighty of the other principal towns of Great Britain and Ireland. The book will be a real boon to all practical sanitarians. It consists partly of tables showing the sources of supply, the quantity supplied, the population, the rateable value, the expenditure and revenue, the scale of charges, and some other details for each important town, and partly of a critical and historical description of the metropolitan and provincial undertakings. The gigantic character of the London supply is shown by the fact that the population of Greater London is now over five millions, and is increasing at the rate of about 100,000 every year. It is estimated that if the present rate of increase is maintained, this enormous population will have doubled by the year 1919. By far the greater part of this wonderful metropolis is supplied by the eight London water companies. Mr. Silverthorne gives great and deserved praise to these companies for their general management, and expresses a strong opinion that the present supply is not only sufficient in quantity, and, with proper precautions, in quality; but is also capable of indefinite expansion to meet the wants of the constantly increasing population. He repeats the familiar arguments as to the danger and injustice of drawing our supply from distant places, and quotes with entire approval the opinion of Sir Robert Rawlinson to the effect that "to sacrifice the present source and lay out fresh capital to bring in some imaginary pure supply would be gross waste of money, and would not accomplish the object intended." From the engineering point of view this argument is unanswerable; but it must not be forgotten that the physician and the chemist have something to say on the other side.

The present supply of water to London is certainly ample, although we occasionally hear of water famines in certain districts. It amounted in 1883 to 144,592,772 gallons daily, or nearly thirty gallons per head of population. But the cost to the consumer is unfairly high, and the profit to the shareholders inordinately large. Mr. Silverthorne, who writes in the most moderate tone, points this out with great clearness. He explains the various modes by which companies can increase their profits and expresses a decided opinion that Parliament must ere long put a check upon them. The doubt we have long felt as to the wisdom of the present system is certainly not removed by the statement.

The statistics of provincial water-supply are very interesting, and occupy the greater part of the book. There is still great inequality in the supply of different towns, but of course there are much greater difficulties in some cases than in others. Hastings is still unsatisfactory, as in the time of our inquiry. The population at the last census was 42,258, and the average quantity of water supplied in twenty-four hours 700,000 gallons, or less than 17 gallons per head, derived in part from surface springs. The new works at Filsham will, it is said, add 500,000 gallons to the daily supply; but, on the other hand, it must be remembered that in the autumn the population is much greater than on the day of the census. The supply in the summer is, moreover, more scanty, and probably inferior in quality. Eastbourne, on the other hand, with a population in 1881 of 24,000, has a daily supply of 1,300,000 gallons, derived from deep chalk and greensand wells, which is equal to 54 gallons per head. Eastbourne is growing so rapidly and its summer population is so large that the supply is by no means too liberal. Brighton, with a population at the last census of 134,954, has a daily supply from chalk wells and adits of 4,500,000 gallons, equal to 33 gallons per head. Glasgow receives about 50 gallons per head each day of the pure water of Loch Katrine.

SOCIETY OF ARTS.—At the meeting of the Society of Arts on Wednesday next, the 11th inst., there will be a discussion on the recent Report of the Royal Commission on Metropolitan Sewage. It will be commenced by a paper by Capt. Douglas Galton, F.R.S. Sir Frederick Abel will be in the chair, and most of the principal authorities on sanitary questions are expected to be present.

THE LANCET.

LONDON: SATURDAY, FEBRUARY 7, 1885.

THE distinction of the Fellowship of the Royal College of Physicians is one which is highly prized. Its value depends not merely upon the privileges it confers and the opportunities it affords for taking a share in the management and educational work of the College, but also upon the fact that it is regarded as a recognition of honest persevering labour in the sphere of medical science. It is, then, looked forward to as an object worthy of attainment by those who have resolved to devote their lives to pure medicine—a pursuit which during many years has no compensation beyond such a distinction as this. It carries with it but little social advantage, but it stamps its holder as one who has chosen a definite line in life; and it should be conferred with strict regard to such a circumstance. Nor should it be alone bestowed upon those who are entering upon a career; it is quite fitting that those who have borne the burden and heat of the day, who have earned for themselves a reputation, should also be entitled to receive almost the only honorary reward the profession can offer. Being, then, as it is the legitimate object of ambition, it is most important that the manner in which the Fellowship is conferred should be, as far as possible, above cavil and reproach. The duty that devolves upon the College in making the selection is therefore one of a momentous kind; and great care should be exercised to ensure that those who are selected are worthy to receive the distinction. It is perhaps unavoidable that now and again some undeserved hardship is apparently inflicted, and that the names of members of the College who are known to have done good and honest work are passed by. No system of election is altogether free from a blemish of this kind. But under a system which leaves the selection of candidates in the hands of a Council the risks of injustice from inadvertence and ignorance are increased. It is true that the Council is supposed to represent the whole body of Fellows, and therefore to be trusted to consider the claims of all eligible members impartially and fully. But it is impossible to expect that the Council can possess all the knowledge requisite for this task; and the unfortunate occurrence of last year, which resulted in no Fellows being elected at all, arose simply from this one reason.

It is nevertheless well known that every Fellow of the College has the right to nominate a Member whom he thinks deserving of the Fellowship, and the nominations so made are placed at the disposal of the Council, in order to aid it in its selection. Now, whether rightly or wrongly, the idea has grown up that the Council is not guided by these outside nominations at all. It is doubtless owing to this impression that the nominations received from the Fellows are absurdly few; and this very paucity suffices to lead the Council to the belief that the Fellows are willing to leave in their hands unlimited discretion. It must, then, have been a rude shock to the Council, and for our own part we do not hesitate to say a most unmerited rebuff, to have had their nomination list returned on their hands. The Fellows of the College by their act of last year, impelled doubtless by unimpeachable motives, really passed a vote of censure upon themselves; for they had neglected their duty in not making nominations, and were not satisfied with the result of the task they had thus tacitly imposed upon the Council.

The present system of election to the Fellowship, if carried out by the College and its Council as thoroughly as it should be, ought to sufficiently safeguard the College from the risk of conferring an honour where it is not deserved or of withholding one where it is merited. To deprive the Council of the prerogative of selection, and to cast the whole responsibility upon the Fellows, might give rise to a state of things much to be deplored. It would open the door to intrigue and canvassing for votes, which are the inevitable concomitants of an open election. It might split the College into factions and damage its reputation seriously, so that the Fellowship would no longer be held in esteem. No such radical change is in fact needed. All that is required is that the Fellows should feel assured that their nominations are thoroughly weighed by their representatives; that the idea that the Council are indisposed to attend to such nominations, fearing that they are often made on considerations other than those of securing the most suitable men for the distinction, should be dispelled. In a word, the Fellows as a body should trust the Council they elect that it will perform its unenviable duty of selection with the greatest circumspection; and the Council in its turn should trust the Fellows to nominate impartially those who are entitled to receive the encouragement of their professional brethren in a career that is opening to them, or the reward of their approbation for years of pure unselfish labour in their profession.

THE agitation against the lunacy laws and in favour of their reform is confessedly, in the main, factitious; but outside the area of this useless, if not actually mischievous, perturbation there is a calm and mature opinion that the law, as it stands, is unsatisfactory, and that it ought to be, and eventually must be, changed. We are anxious to make it clear, to those of our readers who do not yet recognise the position we have assumed, that while we have no sort of sympathy with the mad onslaught of agitators against the private asylum system, or with the unbridled abuse of those who keep private houses of detention for the insane, it is our mature conviction that the whole business is bad and in need of prompt and sweeping amendment. We cannot but regard the trade of keeping private asylums for the insane as incompatible with the position and obligation of members of an enlightened profession. Those who are so engaged nearly all agree with us; indeed, we could scarcely point to a single member of the profession in the way of business alluded to who has not, either publicly or privately, expressed himself in the same sense on this subject. The private asylum system is an anachronism, and those who are personally responsible for its maintenance keenly feel it to be one. If there were no central Board of Commissioners in Lunacy to cast a glamour of respectability on the trade, not a Member or Fellow of the College of Physicians would engage in

it. There must be "abolition." The only question is, how and when will it be brought about? We have no immediate hope in relation to the matter; and we must be excused for thinking that the agitation in progress, to which some among us seem to attach much importance, will not hasten the desired reform. On the contrary, we incline to think it may have the disastrous effect of postponing it.

Dr. BUCKNILL's article in the current number of the *Nineteenth Century*, on the "Abolition of Proprietary Madhouses," falls, we fear, into the category of ill-advised proceedings in agitation for reform of the lunacy laws, and, in so far as it does so, its publication is to be regretted. It is an able composition, admirably written, cleverly argued, and we do not for a moment question the entire accuracy of the somewhat startling allegations made in it. Nevertheless, we do more than question the wisdom of making those allegations, well-founded as they may be. There is such a thing as pushing a policy of defamation too far, so that the effect shall be to turn the tide of sympathy in favour of the class abused. We do not commiserate the asylum proprietors on the position in which Dr. BUCKNILL's paper has placed them. They are rather to be congratulated on its appearance. It is for our side of the case—the opposition—pity needs to be asked. If Dr. BUCKNILL should be anxious to know why we feel and write thus, notwithstanding that on the whole we agree with him, the answer would be simply this: the system is so bad that it is wanton as well as witless to abuse the men. Nor are all his allegations germane to the question at issue. What conceivable bearing on the private asylum system has the fact—assuming it to be a fact—that some asylum keepers have made a profit by letting out their attendants on hire? We fail to see the objection to this particular branch of the business. It is not only, as Dr. BUCKNILL describes it, "a custom of the trade"; it is a perfectly intelligible and commercially sound custom. Nor is there anything whatever more mean or less respectable in this department of the commercial enterprise than in that of letting furnished lodgings, with board, washing, and attendance included; a profit being of course made on every item of the business—house rent, the wear and tear of furniture, the food consumed, and the services of the *employés*. Why all this straining at a puny gnat, when the camel is swallowed without so much as a single grimace? Others of Dr. BUCKNILL's specific allegations are equally open to criticism.

When reform is seriously undertaken, there will be reasonable and sufficient opportunity for the discussion of the real question at issue in all its bearings. We do not complain of the transparently silly objections of those who are interested in maintaining the existing state of matters. They urge that we have no knowledge of the subject and nothing to propose. We *have* a reasonably good acquaintance with the facts, and our proposals have been on more than one occasion placed at length and in detail before our readers. They cover the whole ground, and to them we adhere. We do not expect any great benefit from partial changes in the law. So long as mental disease is looked upon and treated as something apart from the subject of general medicine, and while special *legal* powers are demanded "for the protection of doctors," or "for the safety of society and the insane," there must be dissatisfaction, insecurity, and scandal. In truth, medical men ought to have no more to do with the legal and social disabilities of the mentally diseased than they have with the moral character, the financial position, or the educational attainments of their patients. If the profession were true to itself, it would cut the Gordian knot of all this difficulty by refusing to give or sign any document having a legal bearing or capable of being used in a court of justice, except it be to protect the insane from the legal consequences of responsibility for wrong-doing in their madness. We repeat the affirmation that no single power is needed by physicians engaged in the medical treatment of the insane which the *common* law does not give every citizen. At the present moment *lunacy* law, so far as the insane or society may be concerned, is an idle farce in Scotland: there the doors of asylums are not even locked; no sort of coercion is employed beyond that which every nurse uses in the care of a *patient*, and all goes well. Let this system be adopted throughout the country; let there be no more talk of "lunatics" in the legal sense, but only of *patients* in the medical sense of the term; let *hospitals* replace "asylums," and we shall neither need to clamour and agitate for lunacy law reform, nor will there be any longer reason or use for "certificates."

THE address of Lord REAY, in his capacity of Lord Rector of the University of St. Andrews, on University Reform in Scotland, is sure to have pleased his audience, and may be read with much interest by others. He recommends most freely the creation of new Faculties and more generous endowments of the Scottish Universities. He would have universities fulfil the double function of educating for the professions, including the teaching profession, and providing for general culture and research. He would have by all means a Faculty of Science and a great enlargement of the functions of the Faculty of Law. He would certainly retain the Faculty of Theology, so that clergymen may be trained to grasp the relation of theology to other sciences. His observations on the Medical Faculty of the Scottish Universities would have been more valuable if they had been less flattering and more critical. They were as follows: "About the Medical Faculty little need be said, as it has obtained European fame by adopting many of those improvements which I am recommending for the other Faculties. Nothing that it can possibly require should be refused to it." This is very pleasant language for Scotch professors, but it is not altogether worthy of Lord REAY, who should know that in one part of Europe at least—namely, England—there are many persons of no mean authority who think lightly of the medical work and the medical degrees of the Scottish Universities, and who have only been confirmed in their opinions by the recent action of these bodies in regard to medical legislation. Lord REAY very properly maintained that the placing of the Scottish universities on a level with universities anywhere was a matter of public, not merely local, importance. We should entirely agree to this if the Scottish universities showed a little more readiness to fall in with public proposals for testing the work they do. Their attitude to the Medical Bill of the Government has been that of bodies who believed that the empire existed for them rather than otherwise. Lord REAY explained to his audience that the first thing

for Scotch statesmen to do was to make the most of "Scotch brains," and that the great thing for the Scotch universities is to supply the empire with the professions ready-made. "We have scattered doctors and surgeons broadcast over the empire. Why should we not do the same for other professions?" Why not? That is a question which we may leave the Scotch universities to consider. They have done a great "professional" business hitherto, and it will be their own fault if they do not continue to have a large share of the work of educating the "professions" for the empire. But they must remember that the conditions are altering very much. The schoolmaster is abroad. The Education Act of 1870 has not only extended and improved popular education, but has given a great stimulus in England to secondary education. Universities, too, are multiplying—and universities that receive cheerfully any legislation in the interests of the public. The consciousness of having some slight "brains" even may overtake the community south of the Tweed, and English statesmen may be required, as Lord REAY requires Scotch statesmen, to look to the greater efficiency of universities. Not the least significant part of Lord REAY'S address was the confidence with which he predicted that London is to acquire a splendid university. We share the same faith, and we agree with Lord REAY that such an acquisition would act beneficially by way of competition with the universities of Scotland. Lord REAY would have men *qualified for professions by a university degree, and not by the State examinations, which is the system of Germany.* He may be right, but there is much to be said against this view. If university degrees become the common qualification of men for professions, they will lose that distinctive and honourable character which gives them their special value. Moreover, under such circumstances they would have to be given on low terms—we mean low examinational terms,—which would be a public misfortune. In our judgment, university degrees should be distinctions, not mere qualifications. They should imply more than mere qualification. We cannot doubt that this is Lord REAY'S meaning, for he carefully points out that the one essential element of success in a university is that the teaching should be first-rate. Would he exclude, say from the medical profession, all who cannot command university teaching and a university degree? And are the universities to concern themselves with the mere qualification of medical men, and not with their higher education? We must leave Lord REAY'S address, feeling that perhaps the newspaper report of it has not done him justice, while grateful to his lordship for raising so well questions which concern, as he says, not the Scotch universities, but the empire.

THE decision of Mr. Justice STEPHEN last February with respect to the burning of a body in irregular and revolting circumstances, asserted the legality of cremation when performed in a decent manner. The subject had never been so much considered in this country as to call for the recognition or control of law, and it therefore remained a matter of opinion. That which alone had influence over it was the law of nuisance, which operated equally in the case of burial, and more or less of every social usage. We may say, then, that the permissive stage has been reached in reference to cremation, and that to be burned or buried is at the option of every person who desires to arrange for the disposal of his body after death. The question now before us has to do simply with the advisability of the former method, and the special regulations, if any, which must guide its execution. In the course of many discussions the reasons of general public interest which may be stated on one side or the other have received due consideration. We, as medical men, are naturally desirous to concern ourselves more particularly with that aspect of the case which presents the most notable features to the medical jurist. To register a practical certainty as to the cause of death is also, we observe, justly regarded by the Cremation Society as a first essential to the success of their scheme. They propose in their latest circular, as in those formerly issued by them, to do this by means of the process now in use as the necessary preliminary to burial—namely, by certification where there has been medical attendance during life, and by the usual autopsy where there has not. They propose, in addition, to strengthen the ordinary medical certificate by a second, given on later inquiry by a practitioner who would have to decide whether the circumstances connected with the death as reported to him were sufficient to have caused it. This second assurance is really, then, a repetition of the first, for all the evidence which gives it value is derived from the same sources. The most trustworthy of these is usually of course the visiting practitioner. We admit without hesitation that for many cases these precautions would be ample. Thus, there is to our present understanding of medicine nothing in the course of ordinary acute disease, or for that matter of most diseases which are fairly common, to excite suspicion of unlawful practice. It is no less certain, on the other hand, that the natural and the artificial or criminal factors of disease may, and often do, closely agree in their effects in consequence of their acting along the same lines. Symptoms are moulded on pathology. The structural proofs of local irritation, the physiological inaction of narcotism, are the same for many of their causes. There need be no surprise therefore if now and then the most acute observer may have to trust to informants, in order to trace the history of his own diagnosis.

When we come to chronic poisoning, the uncertainty is at times great, and is very apparent in the action of such drugs as arsenic, strychnia, opium, and mercury. Cases of exhumation, on account of some suspicion as to the real nature of a fatal ailment, have commonly been of this kind, as, for example, that which resulted in the conviction of PRITCHARD. The medical attendant has in such cases, we may presume, had no doubt as to the reality of an apparent illness not due to poison, or it may be the influence of the latter has appeared to be the grateful euthanasia of exhaustion at the close of a long and painful malady. A second certificate might perhaps have been barred by some opposing trifle of detail, but no reliance should be placed on the chance of this occurring. There is no absolute security even in multiplied certificates. They follow one another in line, one may say, and the tendency to repetition is unavoidable. We do not think therefore that the advocates of cremation have materially strengthened their position by their latest circular. In the vast majority of cases in which the *bonâ-fide* course and termination of disease seem

clear to all who are interested in the patient, it is of no real consequence whether the earth or the urn is made the last resting-place, nor even whether the illness and death have been certified or not; but the question is one of law, not of fact alone. Certification is, or is understood to be, applied generally for the satisfaction of law in a few doubtful and exceptional cases. It may fail to give that satisfaction. Then the body is for a long time procurable for examination. Cremation would abolish this final evidence, without offering an equivalent guarantee that life has not been taken by design. Regarding fact as well as jurisprudence, we are unwilling to remove the legal sanction which has been accorded to the burning of the dead, even while we do not approve the practice, though we can clearly see that a feeling of insecurity must belong to it so long as cremationists admit no need for post-mortem examination except in ordinary coroners' cases.

DR. LAUDER BRUNTON'S name is so strongly associated with the scientific aspect of medicine that the Fellows of the Medical Society of London and the profession at large felt perfectly sure that his Lettsomian Lectures would deal with the subject of disorders of digestion in a scientific and able manner, and we may say at once that this anticipation has been fully justified. We have endeavoured, in giving full abstracts of these lectures, to present our readers with the most important matters upon which the lecturer touched, and we shall now make it our duty to further discriminate and arrange the material which Dr. BRUNTON has brought forward. If we were asked what two or three salient features chiefly distinguished the character of these lectures we should select the following: The consideration of the subject of diffusibility in regard to the dimensions of molecules; the importance of the part which that class of bodies known as alkaloids may play in the physiology and pathology of digestion; and the question of the action of some of the newer remedies on the intestinal and neighbouring secretions. There can be no doubt that a knowledge of molecular chemistry will prove to be the most solid and lasting foundation of physiology and pathology. The sizes of molecules, their varying constitution, the interaction of the atoms of which they are composed, and the manner in which molecules behave towards one another—these are questions which it is the aim of molecular physiology to elucidate and explain.

With regard to the diffusibility of various substances through membranes, Dr. BRUNTON has given some important information. MORITZ TRAUBE showed in experiments on diffusion through artificial membranes that a membrane of tannate of gelatine would allow nitrate of barium, with a molecular weight of 130·6, to diffuse through it, and would also allow the passage of all compounds having a smaller molecular weight; but it stopped the passage of ferrocyanide of potassium, having a molecular weight of 211·4. "Membranes may thus be regarded as atomic sieves, and if one substance will not diffuse through a membrane which will allow another to pass, we may consider that the molecules composing the substance which diffuses are smaller than those of the other." The importance of such views on the causation of certain forms of albuminuria is very great. The number of atoms in a molecule of a typical albumen is so numerous, and the modes in which these atoms may be arranged are so varied, that albumens are justly regarded as some of the most interesting chemical bodies, and a thorough knowledge of their actions and composition is very necessary; so that we welcome the prominent manner in which Dr. BRUNTON has brought forward physiological facts concerning albumens, and has given them a place in clinical medicine which men of less daring would perhaps have hesitated to assign them. But surely it is only by thus boldly asserting the practical importance of acquired physiological knowledge that we are likely to gain any large addition to a scientific understanding of the processes of disease. It is, however, with the exposition of the share which alkaloids may take in the morbid and healthy economy of the body that we are most pleased.

It is some time since Dr. BRUNTON called attention to the symptoms of nervous depression which are to be attributed to certain forms of indigestion. At that time alkaloids had not been shown to be formed in the body, but now the evidence which we have to prove the presence in the circulation of alkaloids formed in the intestine is identical with that which we have to show their presence when injected subcutaneously. BOCCI has found that from human urine an alkaloid can be extracted which has precisely the same physiological action as that powerful nerve-depressor, curare. And the alkaloid which BOCCI discovered in the urine has been stated to be identical with the alkaloid obtained by BRIEGER from the peptones formed in the process of digestion of fibrin with gastric juice, which has received the name of peptotoxin. These alkaloids may not be of identical constitution, though their action is like that of curare in paralysing the peripheral terminations of the motor nerves.

In respect of treatment, there can be no doubt that readers of Dr. BRUNTON'S remarks on this subject will gain a clearer insight into a rational mode of dealing with patients the subjects of disordered digestion. Under this heading it will perhaps be most useful to take note of the further knowledge which we appear to be acquiring on the mode of action of some of the complex bodies of the aromatic series. The influence of salicylate of soda on the secretion of bile as well as toluylendiamin, may well form a nucleus or starting-point for a most extensive series of investigations. The former of these bodies causes the bile to be secreted in very large quantities of a very fluid kind, whilst the effect of the latter is in the opposite direction. In this connexion Dr. BRUNTON observed: "We do not yet know whether a similar action on the liver is exerted by substances—we may perhaps say poisons—formed during the process of digestion in the intestine. If such substances are formed, their formation might be consequent on something wrong in the food which had been taken, or on some disturbance of secretion or absorption, or might be due to foreign organisms having been taken into the intestinal canal and having produced there abnormal decomposition."

Throughout the lecture the idea prevails that the intestinal canal is a part of the outside world; and the inevitable conclusions from such an idea—that processes allied to those which occur in the main and tributary sewers of our municipal system of drainage may occur in the *primæ* and

secunda vice of our inside yet outsides paces—may be drawn without conflicting with our knowledge of medicine, even if a little shocking to our sense of refinement.

THE new Conjoint Board is to be congratulated upon the recognition of the value of its examination scheme accorded to it by the University of Oxford. That university has asked permission for its members, who have passed the earlier stages of study, to be eligible for the final examination without passing through the first and second. On their part the Colleges have resolved to admit to the same privileges any member of an English university. We believe that Edinburgh has made a similar application, so that the next very important matter which the *English* Conjoint Board will have to decide will be whether it should afford equal facilities to the students of the Scotch and Irish universities as it does to the English. At a time when the proportion of Englishmen studying medicine in Scotland is steadily increasing, any proposal to still further encourage this exodus by bestowing upon the students of Scotch universities privileges of the same kind as are afforded to those who prefer to remain in England might lead to opposition. Yet, if the Conjoint Board is satisfied that the anatomical and physiological examinations passed by the graduates of Scotch and Irish universities are of the same stamp as its own, it would be unjust to decline any extension of such privilege to the whole of Great Britain and Ireland. Indeed, the London Colleges must feel gratified that there does exist so widespread a desire to obtain their diplomas, and they will act wisely in not placing any uncalled-for obstacles in the way of candidates. The question is one which, however, demands most careful consideration. Meanwhile, an even more important step is proposed to be taken by the University of Oxford. It is this: it will regard the passing of the final examination of the Conjoint Board as equivalent to the final examination for a degree in medicine; but before conferring the degree it will demand of its graduate evidence of higher study, in, we presume, the form of a thesis upon some subject in scientific medicine. We trust that this scheme will speedily be sanctioned by the university. For although it may be said that Oxford thereby gives up its legitimate sphere of medical examination, it only does so to a certain extent. Its students now spend their final years at the London hospital, for Oxford has not the means of providing a clinical education. To the Oxford student it will have the advantage of diminishing the number of his examinations; whilst the university will retain an influence upon higher medical learning which will do more for medicine than any attempt to resuscitate what has been termed the "lost medical school," in a city which does not possess that very necessary part of a medical school—a wide field for clinical instruction. We shall follow with interest the practical working of these proposals.

A NEW mission hospital is being erected at Hang-Chow, the cost being borne chiefly by the William Charles Jones Fund, administered by the Church Missionary Society. Many English and Americans in China have also contributed, and even the mandarins of Hang-Chow. Dr. Duncan Main is the medical missionary in charge.

Annotations.

"Ne quid nimis."

INDIAN MEDICAL SERVICE.

WE learn from our contemporary, the *Broad Arrow*, that the Indian Government has come to an important decision with regard to the travelling expenses of officers wishing to enter the Staff Corps. "Hitherto officers leaving British regiments to join probationary appointments in native regiments have been obliged to defray their own travelling expenses, on the grounds that they are proceeding to an appointment for their own advantage, and also benefiting pecuniarily by the arrangement. In future these officers are to be exempted from the operation of this rule, and to be allowed passages at the public expense, under the circumstances mentioned." The new regulation appears to us to have an important bearing upon one of the undoubted grievances of the medical officers. We have repeatedly called attention to the injustice done them in being required "to pay their way to all appointments in which they draw higher pay." The expense thus incurred is in many instances greater than the benefit derived, especially in the case of "officiating appointments." So far as we are aware the only reason given for maintaining this rule with regard to medical officers has been that the abolition of it in their case might form a precedent for the exemption being extended to the service generally. The new regulation as regards officers joining the Staff Corps removes this objection at least, and establishes a system which ought, in justice, to be extended to the medical corps. In the British medical service an officer proceeding from one station to another, or from one appointment to another, unless in the case of an exchange between officers at their own request, is entitled to the travelling expenses of his rank, or to a free passage, and it is difficult to understand why a similar rule should not be applied to the officers of the Indian Medical Service. Important changes have within the last few years been introduced into the department in the interests of the public service, many of them by no means acceptable to the officers interested, and we do not think it is too much to expect of the Government that it should endeavour to remove the feeling of discontent which has arisen from the new arrangements by abolishing a regulation so manifestly unjust and impolitic.

THE ELECTION TO THE FELLOWSHIP OF THE ROYAL COLLEGE OF PHYSICIANS.

THE time is now approaching when the list of Members recommended for the Fellowship of the Royal College of Physicians will be submitted for the consideration of the Council. It is to be hoped that the *fiasco* of last year will not be repeated. It will be remembered that, owing to some unaccountable delay, the election had to be postponed till a later period in the year than usual, and that when the list did ultimately appear it gave so little satisfaction to the Fellows that it was referred back to the Council to be modified. The cause for this unparalleled rejection arose not so much from the sin of commission as of omission; it was probably felt that great injustice had been done in passing over the names of certain young physicians who had a decided claim to the honour on account of the services they had rendered to the profession as teachers in their respective schools, as well as having contributed to the progress of medical science by the prosecution of original research. In considering the claims of the various candidates at the forthcoming election, the first duty will be to weigh the merits of the junior members, since early election to the Fellow-

ship greatly enhances the honour, and those only should be selected who have earned a recognised position either by practical teaching, as examiners, or by original research. Next in order, the claims of the provincial members should be considered; and these of late years have increased enormously, owing to the development of many of the medical schools in the large towns. Nor should the Army and Navy be overlooked, nor the claims of some of the most distinguished physicians in our colonies be disregarded. It has been usual hitherto to elect on an average about twelve Fellows annually, but with the great extension of scientific work in the provinces and the establishment of universities in colonies, it may be a question whether this number might not be extended to fourteen or fifteen. Out of this number four Fellowships at least should be conferred on junior members as a mark of special distinction for professional work done in connexion with their hospital or the societies. Five Fellowships might be distributed among provincial members, one for each of the services, whilst three would be hardly too many to meet the requirements of India, Australia, New Zealand, Canada, and the numerous physicians practising in the large cities of Europe and America. Finally, one or two might be bestowed for other than professional work, such as for eminent service to the State, distinction in literature, or for pure science. But whatever course the Council may decide on, it is earnestly to be desired that they will carefully weigh the merits of each candidate as expressed on the nomination papers, and not disregard the recommendation of the junior Fellows with regard to election of the younger members. Above all things, a repetition of the events of last year's election must be avoided if the College desires to maintain the prestige of the Fellowship unimpaired.

GOVERNMENT PRECAUTIONS AS TO CHOLERA.

IT is evident that an organised scheme of inspection by officers attached to the Local Government Board is in progress, and that it has for its principal object to prepare sanitary authorities for the possible importation of cholera into this country in case of a recrudescence on the Continent. On the one hand, we find that Dr. Blaxall, R.N., one of the ordinary medical staff of the Board, is renewing the inspections which he commenced along the sea-coast last autumn; and on the other, it is announced that Professor de Chaumont of Netley is expected to represent the Board at some of the northern ports, and that Dr. Davies, jun., of Bristol is at work in the south, advising authorities as to the measures which they should take so as to be prepared beforehand in case cholera reaches our shores. The value of inspections such as these is very great. The comparative freedom which this country enjoys as regards diseases which are due to preventable causes is largely due to the preventive works which have been carried out during non-epidemic periods, to the sanitary improvements effected by the labours of Mr. Simon, his staff, and their successors, as also to the continuous labours of the present body of officers of health; and it is only by continuing to follow out the principle of being ready beforehand that we can expect to prevent the importation of cholera or to check its progress if it finds its way into our midst. Above all things is it necessary, first, that at all our ports there should be a sufficient staff for inspection purposes, and sufficient means for the immediate isolation of actual or suspected cases; and, secondly, that all sanitary authorities, whether in connexion with ports or inland, should similarly be prepared to deal with the sick, and should get rid of all conditions of filth in their districts which are likely to contaminate the air, water, or food of the community. After the epidemic of cholera in Egypt in 1883 the Italian Government made a number of proposals as to some concerted action on the part of the various European States, with a view of preventing the diffusion of the disease from the East; but, so far as could be judged by the ordinary Italian press, the attitude of Italy was then not such as was likely to secure the end they professed a desire to attain, and the epidemic of 1884 put the question aside for a time. But Italian views have, it is believed, undergone a material change since the proposal was first made; and it is stated that a new proposal of a similar sort has not only been made, but this country has decided to join in an international gathering by sending a delegate. The occasion may be regarded as an opportune one, for the countries in which the late epidemic so specially prevailed, have had an opportunity of learning afresh how utterly futile the sanitary cordons and allied preventive measures, on which they have hitherto relied, become in the moment of danger; and it may be that the more advanced views which have been long favoured in this country, and which have also come to be relied on in Germany, may ultimately form the basis for some general European action against the diffusion of disease.

THE INCREASE OF THE POPULATION OF FRANCE.

AT a late meeting of the Académie de Médecine, M. Rochard, who is evidently fond of statistical inquiries, read a paper on the rate of increase of the French population. Our readers may remember that in the early part of 1883 (THE LANCET, vol. i., page 417, 1883) we had occasion to draw attention to a remarkable attempt made by M. Rochard to estimate the loss in wealth that a nation sustains from such a preventable disease as typhoid fever. M. Rochard has now directed his attention to the causes of the slow augmentation in the number of Frenchmen. The French population grew at the rate of 6·30 per 1000 living at the beginning of the century, whereas the apparent increase is now represented by 3·34 per 1000; the real increase is, however, lower than this estimate, and may be put down as 2·47, a proportional rate which is even too high when emigration is taken into account; so that the actual augmentation of the French population cannot be given as more than 1·65 per 1000. This small increase cannot be explained on the ground of diminution in the number of marriages; for marriages are relatively more common now than they were in the beginning of the century. On the other hand, the number of children born in wedlock would seem to have suffered considerable diminution. This poverty of legitimate births is related to a voluntary abatement of fecundity, as well as to an involuntary loss of fecundity. The doctrines of Malthus, though not well known in France, still appear to be put in practice to a considerable extent. In the provinces the limitation of family would seem to be directly due to anxiety concerning property, whilst in towns the increase in family would lead to increased expenditure, which is so much dreaded. In the higher classes considerations of another kind present themselves. In this case the fear of the fatigue and danger to which the young mother is necessarily liable, and the altered appearances due to pregnancy, which also prevent the full enjoyment of society, seem to be the reasons for wishing to prevent increase of family. Moreover, to have many children is considered to be *mauvais goût*. The report goes on to say that France cannot be allowed to remain idle whilst other nations are in arms, for she needs children for her defence, children born of *le vieux sang français*. The upper paths of life are overcrowded, every one seeks to attain to the highest places; agriculture is deserted; peasants leave the country for the town; the rural population, which was formerly three-fourths of the whole of France, now measures barely two-thirds. M. Rochard concluded his paper by asserting that

"the evil is in our midst, and that public opinion must be brought to bear on the question." M. Le Fort considered that the Civil Code exercised some influence in causing the feeble increase of the population; for in Germany, the only province which did not increase its population was that which still retained the French Civil Code.

LEAD-POISONING.

A CASE was recently brought before Mr. Bushby, at Worship-street, which showed how unsatisfactory the Factory and Workshops Act is so far as concerns the protection it affords to men in factories where unhealthy trades are carried on. In this instance the complainant informed Mr. Bushby that he had been employed at a white-lead manufactory, and that in consequence of the owner not complying with the rules laid down in the Factory Act he had lost the use of his limbs, and that he now wanted to proceed against the owner for the damage he had received. Mr. Bushby was unable to afford the man any assistance, since he could not find that the Act was intended for the protection of men, but only of women and children. If this should prove to be the case, then the sooner the Act is amended the better. It may be all very well to say that men can protect themselves, but it often happens that the men are ignorant of the risks they run, or at least do not know how to guard themselves effectually against the dangers of an unhealthy trade. In this case it was alleged that the owner had failed to secure the attendance of a doctor to visit and examine the workmen at stated intervals, as required by the Act, so that the unhappy man, instead of having the particles of lead removed from his system before they had damaged his tissues, and at a time when treatment might have been effectual, was allowed to continue to imbibe the poison till paralysis resulted. Should such neglect to provide protective medical inspection be proved to be true, we can hardly imagine that a penalty is not incurred, and even should the Factory Act fail to reach the offender, it is to be hoped that the Employers' Liability Act would at least provide the injured man with some compensation for the terrible and lingering disease inflicted on him.

"WHEN DOCTORS DISAGREE."

ON January 19th the Ipswich Borough Coroner resumed and completed an inquiry into the cause of death of a pauper in St. Peter's Workhouse. It was alleged that the deceased woman had been struck on the head by the nurse in attendance, and the object of the investigation was to ascertain if such supposed blow had shortened the duration of life. The post-mortem examination was conducted, at the request of the jury, by Mr. Hetherington, a gentleman disinterested in the case. The body was fairly well nourished. There were two or three insignificant bruises on the limbs; there were four discharging openings on the neck. The scalp, cranium, and dura mater showed no signs of violence having been inflicted. Beneath the pia mater, on the right hemisphere of the brain, was some lymph, the result of recent meningitis. The large curvature of the stomach was infiltrated with cancerous growth, and behind the stomach were some enlarged glands, and also an abscess. The lobe of the right lung was consolidated, and the pleuræ were generally adherent. The right side of the heart was enlarged. It was an interesting and singular fact that during the lifetime of the patient the malignant disease of the stomach had not been suspected; but this may be explained by the circumstance that neither orifice of the viscus was involved. It is true on one occasion the deceased was treated for "colic," but this seems to have been the only symptom referable to the abdominal organs. It passes our comprehension why Dr. Elliston and Mr. Hetherington should have so utterly failed to agree in their opinion as to the cause of death. The former said the fatal issue was due to meningitis; the latter as strongly contended that it was the result of cancer of the stomach. It was a pity they did not recognise the relation that one lesion probably bore to the other. The proximate cause of death may have been meningitis, but surely it was not fair to exclude the antecedent conditions—suppuration in the neck and abdomen and cancer of an important organ. Every pathologist knows that in the advanced stages of malignant disease venous thrombosis is not rare; and may not the meningeal effusion have been the consequence of clotting in the convolutional veins? Again, a patient exhausted by the cachexia of carcinoma is likely to develop secondary pyæmic changes in the presence of purulent foci, such as were found in this case in the neck and abdomen. We leave without comment other points in dispute between Dr. Elliston and Mr. Hetherington, as they were not very material to the inquiry. The view of each one seems to us too exclusive, while the facts as deposed to warranted a very clear expression of opinion of the cause of death. Whether or not the discredit thrown on the nurse was merited it is not our province to decide; but it is only fair to state that from our reading of the evidence there seems no grounds for supposing that deceased succumbed to other than natural causes. The verdict of the jury, which we append, was a sensible one:—

"That the medical evidence brought before the jury being very conflicting as to the actual cause of death, we return our verdict that death arose from natural causes; and we very much regret that, owing to the great difference of opinion of the medical gentlemen, we are unable to say whether death arose from cancer or meningitis. The evidence brought before the jury has disclosed certain circumstances in reference to the death of Maria Cleveland which the jury recommend should be inquired into by the Local Government Board, and they request that the coroner should forward a copy of this recommendation to the proper authorities."

The coroner undertook to comply with the request of the jury.

SANITARY ADMINISTRATION IN IRELAND.

AT the Congress of the Sanitary Institute, which was held in Dublin in 1884, Dr. Edgar Flinn read a paper on the administration of the Public Health Act in Ireland. He explained at the onset that, with the exception of a few towns, such as Dublin (under Dr. Cameron's supervision), the Public Health Act in Ireland was a dead letter, and after making allowances for the differences between England and Ireland, both as regards wealth and other matters, he arrived at the conclusion that the principal cause of the great contrast in sanitary administration was that in Ireland the health officer was the district Poor-law medical officer, whereas in England so many officers of health are either specially skilled or give their whole time to their duties. As an ex-officer of health in England Dr. Flinn contrasted the reception given to health reports by the Irish guardians and by the English guardians respectively, in their capacities as sanitary authorities, and though he drew too rosy a picture of the English reception, at least in a number of sanitary districts, yet his statement that the Irish reports are rarely listened to and are often conveyed straight to the waste paper-basket is, we fear, but too true. As a general rule, it is a great mistake to appoint a certain number of medical practitioners to hold a health office merely because they happen to hold a Poor-law one. And not only so, but since there are nearly always several Poor-law medical officers to each union, the result is that in health matters the sanitary authority have a number of advisers scattered over different portions of their district,

instead of a single one. Owing to this circumstance alone they seek the advice of none. Where a single officer has the duty of advising an authority, a definite responsibility is vested in him, and he nearly always succeeds in performing his duty with some degree of efficiency. Without doubt, the point raised by Dr. Flinn is an important one, and it will have to be dealt with before an efficient sanitary administration is secured for Ireland. But we fear that there are other reasons than the one to which prominence is given for the laxity which obtains across the Channel. Money is scarcer there than with us, the education of the inhabitants in the rural districts has been long and sadly neglected, and even amongst many of the better classes there is not the same appreciation of the value of sanitary work as is the case in England. Ireland, too, lacks the educating element of a staff corresponding with the medical department of the English Local Government Board, and though both countries have need to make more rapid progress than they have done, yet Ireland has the largest amount of lost time to make up.

RESEARCHES ON THE NEUROGLIA OF THE RETINA OF VERTEBRATA.

IN the first part of the *Archives Italiennes de Biologie* for 1885, Dr. Joseph Sacchi gives an account of certain special investigations he has made in regard to the structure of the retina. H. Müller demonstrated before his lamented death that in all vertebrates there was a system of nucleated elements, which he termed fibres, that were sometimes disposed in fasciculi and were sometimes isolated, traversing the whole thickness of the retina from the internal limiting membrane to the external nuclear layer. He further showed that in some animals there was a second supporting system running parallel to the retinal layers. Hence he advanced as a general fact relative to the structure of the retina that in the nuclear layer the supporting apparatus formed by the radial fibres is reinforced. This reinforcement is formed partly by the radial fibres themselves, by means of lateral offshoots decussating in different planes, and in part by special elements which are isolable and belong exclusively to the nuclear layer, such special elements being particularly evident in the retina of fishes. M. Sacchi gives the results of the observations of Rivolta, Golgi and Manfredi, Rampoldi, Dogiel, and Tafani. He has himself examined the retina of Petromyzon, Esox lucius, Tinca italica; Bufo vulgaris, Rana esculenta; Tropidonotus natrix, Platydactylus mauritanus, Emys europæus, Testudo græca; Columba livia; Canis, Felix catus, Bos taurus, Equus caballus, and Cercopithecus. He appears to have obtained the best results in the case of Emys europæus, Testudo græca, and Petromyzon marinus. The eyes were quickly removed after death and placed in a 0·30 solution of osmic acid, and then into one of potassium bichromate of nearly equal strength, and finally into a chloride of sodium solution coloured with eosine. In the Emys, the anterior layers of the retina up to the neurospongium are continuous with one another, and the feet of the rods and cones are seen to be connected with the nuclei situated at different heights in the external nuclear layer. The inter-granular layer is composed of bodies of elongated and usually more or less triangular form, resembling smooth muscular tissue, but giving off branches at various points of the surface which gradually become attenuated, and after dividing dichotomously, end in extremely fine processes. Their contents are homogeneous without granulations or striæ, and there is no trace of a nucleus. Their length varies between 65 μ and 97 μ, and their diameter between 3 μ and 5 μ. The successive layers of the retina in Emys europæus are, then, as follows:—The rods and cones, presenting an external limb, a coloured droplet, an intercalated portion and an accessory portion; an external limiting membrane; the outer granule layer or large visual cells of Dogiel with large basal cellules; the intergranule layer; the internal granule layer with the fibres of Müller and nerve cells situated alongside the neurospongium, constituting the spongioblasts of Müller; the neurospongium; the ganglion cell layer; and, lastly, the layer of optic nerve fibres.

THE POWERS OF WATER COMPANIES.

IN a special report which has been submitted to the Kensington Vestry Dr. Dudfield draws attention to a case in which twenty separate business premises in a mews in his district were suddenly deprived of their water-supply by the action of the Grand Junction Waterworks Company, who severed the service pipes to the several premises because the landlord had failed to pay the water-rates. In this case the landlord's default to make the proper payment seems to have been inexcusable; but Dr. Dudfield refers to the case mainly with a view of showing how needlessly extensive and arbitrary are the powers with which water companies are vested in this matter. Not only can groups of houses be thus suddenly deprived of one of the necessaries of health and life, but if any neighbours or friends were to give those persons whose water has been cut off a supply from their own service pipes, or were to allow them to take enough for their needs, they would render themselves liable to penalties of ten pounds and five pounds respectively; whereas the company could, without resorting to so extreme a measure, recover the rent for water by an ordinary legal process. It is true that in the case in question the company, after the matter had been made the subject of public comment, fixed a stand-pipe in the mews, and so prevented an actual water-famine; but it seems clear that water companies have in this and allied respects powers which are much in excess of those which should be granted to bodies having a monopoly of one of the requisites of life, and we are glad to observe that all the details of the case have been brought under the notice of the Local Government Board, of the Home Secretary, and of the Royal Commission on the Housing of the Working Classes.

DEGENERATION AMONGST LONDONERS.

THE lecture delivered last week by Mr. James Cantlie on "Degeneration amongst Londoners" was received with approval not unqualified by dissent. The address, while true to the concentrated life of many large towns besides London in its general tenour, might be said to be a diagrammatic, or rather a scenic, portrayal of that life. Some of its statements could hardly be received without a qualifying grain, as that, for instance, which declared a pure Londoner of the fourth generation to be impossible. It dealt principally, moreover, with the poorest class of town dwellers, among whom the struggle for existence is seen in its rudest and acutest phase. This fact, no doubt, has served to heighten the colour of the picture. At the same time, it must be admitted that the variation is rather one of shade than of contour, and arises not unnaturally from the necessities of illustration which belong to the subject in question. He who would find the centres of decay in a nation, still on the whole robust and active, must seek for them at the points of social tension. The proofs of pressure, starvation, and atrophy, of vice and of brutal reversion, and of their results are all to be found here. The beginnings of the same process may be watched and often remedied in other grades; in this class, one frequently sees the beginning run on to its end in a single generation. Mr. Cantlie is not disposed to let this happen. He does not speak as a mere melancholic or idle image breaker, but as a practical healer of abuses. His means of cure are two: fresh air and exercise. With regard to the vital importance of each of

these to all normally formed persons there can be no question. The existence of various well-known societies and committees for the direct promotion of wholesome living is evidence enough to this effect. The subject for consideration rather is, how to bring these necessary luxuries—for so they must now be described—within reach of the many who have them not; and for the solution of this problem no answer which is not practical is worth having. Any such answer must of course affect the working of our whole civic system. Work, means, and food, the regulation of working time so as to allow of a fair measure of personal leisure and of sleep, are equally matters of the first significance, and may be said to form in many cases the standing ground required for the operation of all other remedial measures. We have good hope that the national mind, recognising that there is degeneration and that it is curable, will continue to treat it with sympathy, as it has begun to do, and will direct upon it the fresh air of public discussion and the healthy exercise of a wisely corrective legislation.

MILK EPIDEMIC IN THE STATE OF NEW YORK.

DR. F. C. CURTIS gives an instructive account in the Fourth Annual Report of the State Board of Health of New York on a sudden outbreak of enteric fever at Port Jervis in the autumn of 1883. Isolated attacks occurred at intervals from October 1st to the 15th, on which latter day a batch of six cases was reported; eleven attacks took place in the two days, October 24th and 25th; nine, seven, and eleven more were recorded on the next three days, and at intervals up to November 12th the fresh cases averaged some six a day, after which date a subsidence set in, the last case occurring on Dec. 24th. Port Jervis contains a population of about nine thousand inhabitants, and 148 cases of enteric fever occurred amongst them. Previous to the occurrence, the locality had the reputation of being healthy. The outbreak arose, suddenly and subsided with similar rapidity; it was limited to Port Jervis. There were apparently no special foci of infection, the disease being distributed here and there without any special reference to sanitary or other local circumstances; and a comparatively large proportion of the members of each infected family were attacked. By a process of exclusion, Dr. Curtis eliminates many of the ordinary causes of enteric fever distribution; and he then points out that, whereas there were some twelve milk vendors in the place, nearly all the cases occurred amongst some 500 who received their milk from one special vendor; indeed, out of the total of 148 cases, 128 took this special milk. A portion of the milk delivered by the dairyman in question came from a farm in the Neversink valley, and on inquiry it transpired that enteric fever broke out in the family residing there in the previous August, and was still prevalent at the date when Dr. Curtis made his inquiry into the circumstances of the epidemic. After ascertaining all the arrangements carried out in the dairy, Dr. Curtis came to the conclusion that three ways were open for the infection of the milk. In the first place, the well on the premises might have become infected from the deposit of the excreta and the bath water. The infection might also have reached the milk cans either directly by means of the infected air of the premises, or by reason of the cloths used for cleansing the cans, these cloths being at times hung up to dry in a place having direct aerial communication with an infected apartment. And, lastly, it was possible that those coming in contact with the sick might have conveyed infection directly to the milk, owing to the part they took in the dairy operations. Under any circumstances, the milk was not only liable, but almost certain, to receive infection under the operations carried out at the dairy farm. Milk contamination fully accounted for the fact that of those attacked by the disease 87 per cent. were persons supplied by the one dairyman; and it also explained the circumstance that no other cause of disease except milk infection could be ascertained to exist in the place. The discovery of milk as the source of infection also led, by the suspension of the supply, to the cessation of the outbreak. In this dairy farm it is stated that "at least ordinarily scrupulous care" was taken in the handling of the milk. This is often the case when disease follows in the track of the milkman; and it seems quite evident that no such supervision of dairy farms or milk-shops as can in practice be carried out suffices to eliminate all possible sources of infection. Those who drink cooked milk only have invariably escaped milk infection even when subjected to the same influences as those who have been attacked; and each fresh milk epidemic tends to prove that safety against infection can only be secured by the boiling or cooking of all milk used for domestic purposes.

NUISANCE FROM BRICK-BURNING.

THE Society of Medical Officers of Health have recently had under consideration the very general complaint which has been made in the outskirts of the metropolis as to the nuisance arising from the process of brick-burning. During the sultry weather of last summer many persons, it is alleged, were compelled to get up in the night to close their windows against the offensive effluvia, and the Council of the Society express the opinion—first, that there are sufficient reasons for regulating this trade by bye-laws, as other offensive trades have been, with such manifest advantage to the public; and, secondly, that owing to the considerable distance which these effluvia travel, and to the fact that many of the brickfields contributing to the nuisance are outside the metropolitan area, legislation should be general, and apply to areas within a specified distance of centres of population. With the general conclusions arrived at we fully concur, for at present one of the most offensive trades to which towns are subjected is carried out quite regardless of the large amount of discomfort which it occasions to the populations living in the vicinity of the works.

THE LATE REV. DAWSON WILLIAM TURNER, D.C.L.

ON the 29th ult. there died in Charing-cross Hospital, of which institution he was an honorary life governor, a man who, though not a member of our profession, was in deep sympathy with it, and who in some respects was a very remarkable personage. The work of the last ten years of his life chiefly concerns us now, and it may suffice to tell here that Dr. Dawson Turner was the son of the well-known banker of that name in Yarmouth. He was a demy of Magdalen College, Oxford, took deacon's orders, and after some years became head master of the Royal Institution School, Liverpool. Here he did excellent work, and had a succession of distinguished pupils. On resigning his head mastership, he settled in London, and followed with much interest the practice of the surgeons in the out-patient departments of several of the hospitals, notably at Westminster and Charing-cross. He wrote a pamphlet, entitled "Hints and Remedies for the Treatment of Common Accidents and Diseases, and Rules of Simple Hygiene,' which has passed through nine editions. In preparing this he was careful to secure assistance from several of his friends and old pupils in the profession. He was a constant contributor to the Press on subjects connected with hospital management, and was especially interested in securing supplies of books, newspapers, and clothing for the inmates of many of the London hospitals. He visited the wards of one or two hospitals regularly, recited poetry to the patients, listened to their tales of distress, and ministered both to their bodily and spiritual welfare. Spending next to nothing

on himself, he did good by stealth, and none appealed to him with a worthy claim in vain. In addition to several excellent classical works, including his well-known "Notes on Herodotus," he issued a capital series of Analyses of Greek, Roman, English, and French History, and Grammars of the French, German, and Italian languages. His interest in matters medical was dated from an early period, when a schoolfellow of Sir James Paget's; and he was naturally proud of his nephew, Sir Joseph Hooker. Amongst his numerous pupils were the present Bishop of Ripon, Sir George Campbell, Canon Duckworth, and Professor Warr of King's College; he also claimed Dr. Dyce Duckworth and Mr. Thomas Pick amongst these. His only son is now studying medicine in the University of Edinburgh. Dr. Turner was seized with left hemiplegia in the Strand on the 17th ult., and was taken to Charing-cross Hospital. He rallied to some extent, but succumbed to an attack of facial erysipelas, from which he had twice previously suffered. He was in his seventieth year. A friend of the friendless, a humble follower of his great Master, all who knew him are left the poorer by his death—certain, however, that he had well done his work and left a noble example behind him. Of him it may truly be said—"Exstinctus amabitur idem."

THE MEMBERS FOR SOUTH-EAST LANCASHIRE AND THE VACCINATION QUESTION.

IT is curious to watch the dilemma of a member of Parliament with an honest and intelligent mind betwixt the clear duty of upholding vaccination as the greatest boon conferred on humanity by Medicine, and the desire to conciliate the fanatics who see in it nothing but a means of mischief. A case in point occurred on Saturday last, when Mr. Leake and Mr. Agnew were confronted with the anti-vaccinationists. The members stood fairly well to their convictions as regards the propriety of making primary vaccination compulsory; but they might with a little more trouble have easily made out a much stronger case, and might have reminded their well-meaning but unintelligent constituents that within the last few weeks one poor man in London has paid dearly for his breach of this most beneficent law by the death of three unvaccinated children. Mr. Leake's reasoning on the question of compulsory revaccination was a little peculiar. He seems to have had a very remarkable experience on this point. We had better quote his own words: "As for revaccination, his experience of it was so serious and costly—the revaccination of his household in London a few years ago had cost him between £50 and £70—that in the future he would take any risk rather than have the operation done again." Such an unusual and unfortunate experience can be no argument against a system by which the operation would be done for the people for a trifling sum at the public expense. But though we can neither understand nor defend the cost of Mr. Leake's revaccinations, we can assure him that one case of small-pox—even a mild one in his family in the middle of a London season—would be a more costly, serious, and annoying business than even such a bill for revaccination. Mr. Agnew found it equally difficult to be unfaithful to the overwhelming case for vaccination and to resist the enthusiasm of its opponents. He held out a vain hope that, as medical men had given up bleeding, they might one day give up vaccination, and enable members of Parliament to make discreditable pledges to its opponents. Mr. Agnew is not likely to be thus helped out of his perplexity. We are nearing the centenary of the scientific demonstration by Jenner of the protecting virtue of vaccination. Under its influence, well repeated, but not indefinitely repeated, small-pox nurses live with absolute impunity in small-pox hospitals, repeating and confirming Jenner's demonstration to all who have eyes to see. The century is a critical one; but, so far from abolishing vaccination, it is extending the principle embodied in it to other diseases, and science is only grieved that it cannot do so more extensively. Public men will be well repaid, and will do an infinite public service, in informing themselves on this great question, and in courageously stating the teachings of science and of common sense.

TUMOURS OF THE PITUITARY BODY.

PATHOLOGICAL anatomy affords abundant illustration of the principle that morbid action is prone to occur in tissues and organs which have ceased to take any important share in the physiology of the economy. At the Pathological Society on Tuesday last the members were treated to an inspection of several new growths of the pituitary body. The development of the hypophysis cerebri, or pituitary body, as it is commonly called, has been the subject of considerable controversy amongst embryologists. Von Baer and Schmidt taught, in 1862, that the whole of the gland was developed at the expense of the infundibular process at the floor of the third ventricle. In 1838 Rathke stated that a diverticulum from the upper end of the alimentary canal shared in the formation of the hypophysis. Dursy made the pituitary body to be formed out of the end of the notochord, as well as of the epithelium of the alimentary tract. Reichert at first believed this structure to be developed from the remains of the front end of the notochord, but later on he considered that the pia mater was chiefly involved in its formation. Rathke also modified his earlier views, and came to believe that the diverticulum of the alimentary canal disappeared, and that the hypophysis cerebri was developed from a portion of the mesoblast, in front of the clinoid process. Wilhelm Müller wrote an elaborate memoir on the development of the pituitary body, in which he made out that a hypoblastic diverticulum from the upper end of the alimentary tract joined the infundibulum from the third ventricle. Götte and others, however, believe that the epiblast of the stomodæum is concerned in the formation of the diverticulum which goes to meet the infundibular process, and this was the view which Mr. J. B. Sutton adopted at the discussion on Tuesday night. The excellent specimens of the myoneuroma shown by Dr. Hale White contained abundant nerve cells and striped muscle fibre. The mesoblast around the upper end of the alimentary tract is no doubt the source of these striped muscle fibres, and the explanation proffered by Mr. Sutton that a larger amount than usual of nipping off of the epiblast took place is very reasonable, though it seems to us hardly necessary, seeing that it is almost impossible for an epithelial diverticulum to be formed without including some of the mesoblast which invariably surrounds it. All that is requisite to suppose is that this mesoblast underwent an unusual development.

THE USE OF CARBOLIC ACID IN PURULENT AFFECTIONS OF THE CONJUNCTIVA AND CORNEA.

DR. BURNHAM of Toronto, in a paper published in the *American Journal of Ophthalmology*, strongly advocates the use of a 5 per cent. solution of carbolic acid in gonorrhœal ophthalmia, especially in those cases where there are deep transparent excavations. In such cases he directs the patient to be kept in bed; a large basin of cold water, cooled by ice, is placed at the bedside. With this the eyes are to be frequently bathed, whilst cloths wetted with it are to be kept on the lids. The 5 per cent. solution of carbolic acid is to be thoroughly applied every hour. It produces but little pain, and by degrees it is to be exchanged for a 2½ per cent. solution. It acts as an antiseptic and astringent. Dr. Burnham finds it effective in cases of kerato-iritis.

CONVOCATION OF THE UNIVERSITY OF LONDON.

THE adjournment of Convocation to the 3rd instant enabled it to get through the long agenda list which was submitted at the January meeting. A motion by Mr. F. W. Aveling, urging greater limitation in the sphere of examination in Greek and Roman history at matriculation was after discussion referred to the annual committee. It was also resolved that the scriptural examination should be thrown open to all graduates; and another motion, requesting the Annual Committee to frame a scheme for promoting the formation of a union "which should aim at bringing members of the university into frequent friendly and intellectual intercourse," was also carried. Some debate arose upon a proposal that in the selection of examiners preference should be shown to London graduates, and ultimately this was lost by a considerable majority. It was also resolved that Convocation should meet at least three times annually. In the course of a debate upon the D.Lit. degree, the Chairman stated that changes were about to be made in this examination and in that of the D.Sc.—the basis of which is the recognition of original work in higher literature or science as qualifying for the degrees. The rest of the business referred to the M.A. degree, including the passing of a resolution recommending that modern languages be made a branch of that examination.

SANITATION AT WOOLWICH.

IT is strange that Woolwich, an important garrison town, should not only be without a medical officer, but that the local board of health, which by the way until very recently did not number a single medical man among its members, should be strictly within its legal rights in omitting to appoint an officer. The way in which this legal hiatus came about was this: Woolwich was included in the Metropolis Local Management Act of 1855, but by a saving clause the new powers and duties conferred upon metropolitan local boards were not extended to Woolwich; and, on the other hand, this parish is not subject to the Public Health Acts of 1872 and 1875, so that it could only appoint a medical officer under a permissive provision of the Public Health Act of 1848. But the local wiseacres misunderstanding the objects and duties of a medical officer, and the town happening to have been free for some years past from any serious epidemic, maintained that such an officer is quite superfluous. The Local Government Board Inspector, Mr. Spear, who has just issued a report upon the "Sanitary Condition and Administration of the Local Board District of Woolwich," is of a very different opinion. He points out that it is impossible, without the supervision of a skilled medical officer of health, to deal satisfactorily with the overcrowding, infectious disease, unhealthy houses, nuisances, &c., which he found to exist.

DEATH OF DR. W. STORY.

AN inquest was held on the 27th ult. on the body of Dr. William Story, who died somewhat suddenly at his residence at Linslade on the previous night. A verdict of death from natural causes was returned. It will be within the recollection of our readers that at the winter assizes held at Bedford in October, 1881, Dr. Story was convicted on a charge of arson, and sentenced by Mr. Justice Matthew to five years' penal servitude. There being strong reasons to believe that the offence was committed while the prisoner was in a state of insanity, strenuous efforts were made to obtain a remission of the sentence, and a petition was sent to the Home Secretary praying for a mitigation of the punishment. This petition we published in our issue of June 24th, 1882, remarking that if the facts therein stated were correct, the case was one not for suit but for remonstrance. Towards the end of 1883 (we think in October) Dr. Story was released from prison and returned to reside at Linslade, where, as above stated, he died on the 26th ult., aged seventy-two years. He had been seriously ill from time to time after he returned home. We regret to learn that Mrs. Story is left quite destitute; she is sixty-six years of age, and her grievous troubles of the last few years have so impaired her health as to incapacitate her from earning her livelihood. We therefore venture to appeal to our readers on her behalf. Mrs. Story's address is Wing-road, Linslade, Leighton, Beds.

LUNACY REFORM AND POOR-LAW MEDICAL OFFICERS.

AT a meeting of the Council of the Poor-law Medical Officers' Association, held Feb. 3rd, attention was drawn to the proposed Lunacy Law Amendment Bill, from which it would appear that in future Poor-law medical officers will be debarred from examining lunatics, and that such duty will be vested in medical officers of health, the family medical attendant, and superintendents of asylums. It was resolved, "That this Council feels strongly that such a step would throw an undeserved slight on the 3500 Poor-law medical officers of England and Wales. The Council sincerely trust that every Poor-law medical officer in his respective district will at once place himself in communication with his representative in Parliament, so that such Bill may be amended when in Committee."

THE CARRIAGE TAX.

THERE is an earnest and commendable endeavour in progress to promote the abolition of the carriage-tax. Medical men who use carriages chiefly for professional purposes are much interested in the accomplishment of this reform. It is thought that if the tax were abolished there would be a considerable increase in the number of carriages kept, if not in the number of persons keeping carriages. We venture to doubt the accuracy of this conjecture; but, be that as it may, in so far as this burden of taxation falls on the shoulders of those who use carriages for business purposes, it is an impost on industry. Looking at the matter in this light, we are entirely with the promoters of the movement, and they have our warm sympathy.

THE HOSPITAL SATURDAY FUND.

THE eleventh annual meeting of this Fund, under the kindly presidency of Mr. Samuel Morley, was recently held. The promoters, on the motion of Mr. Lucraft, pledged themselves to do all they could to increase the number of collections in workshops. The Workmen's Convalescent Home, St. Margaret's Bay, near Dover, was alluded to with reasonable satisfaction by the President, who offered £400 towards defraying the debt of £2000 remaining on the Home if others would provide £1600. This would enable the committee to receive 100 more patients. Mr. Morley's offer should meet with a hearty response.

BOARDING-OUT OF PAUPER CHILDREN.

MISS ANNETTE PREUSSER complains, in a letter to *The Times*, of the unfairness to those who believe in the boarding-out of pauper children of the action of the Local Government Board. The Board objects to appoint a general inspector of such children because only a thousand are so boarded, and the board of guardians are not allowed to visit and inspect for themselves. We think there is enough evidence in favour of this system to entitle it to a little more encouragement from both guardians and the Local Government Board.

WATER-SUPPLY IN THE ORMSKIRK RURAL DISTRICT.

THE need for a proper water-supply for Burscough Bridge in the Ormskirk rural district has for some time past been under discussion; the existing wells are polluted, and a culvert by the canal which is resorted to is apt to fail in dry weather, and is liable to be fouled by filth deposited by the occupants of boats and barges. When the sanitary authority recently made a move towards procuring a proper supply, they were met by the resolution of a meeting of ratepayers opposing the scheme on the ground of expense; and, apparently fearing to do anything in opposition to these people, the matter is to be allowed to drop. No such resolution can, however, relieve the sanitary authority from the duty it has of seeing that the inhabitants of its district are provided with a proper water-supply, and for any ill results which may ensue in consequence of their failure to make such provision the authority will primarily be responsible.

PROPOSED EXTENSION OF THE ROYAL SURREY COUNTY HOSPITAL.

WE are glad to hear that more than £1700 have already been promised towards the sum of £6000 required for the carrying out of the above desirable proposal. The annual meeting of the governors of the hospital (the president, the Bishop of Winchester, in the chair) will be held on the 28th instant, and we trust on that occasion many additional names with substantial sums attached to them will be added to the subscription list. It would seem advisable that the larger towns of Surrey, especially Guildford, where the hospital is situated, should be actively canvassed with a view to securing small contributions. Not only does "Mony a little mak' a mickle," but it is very desirable that those classes who enjoy the benefits of the hospital should at least have their attention directed to this present opportunity of expressing their gratitude to, and appreciation of, such an excellent institution. Contributions, we may add, will be gladly received by the Treasurer, R. J. Shepard, Esq., Guildown House, Guildford, and by the Assistant Secretary, T. Taunton, Esq., at the hospital.

THE MEDICAL SOCIETY OF LONDON.

THE last Lettsomian lecture was delivered by Dr. Lauder Brunton at the meeting held at the Medical Society's Rooms on Monday last. At the conclusion of the lecture, Dr. Hare proposed, and Dr. Milner Fothergill seconded, a cordial vote of thanks to Dr. Brunton, expressing a wish also that the lectures would be published for the benefit of the profession at large. The vote was passed with acclamation. Elsewhere we have drawn attention to the salient features of these lectures. Next Monday night Mr. Henry Morris will read a paper on Some Points in the Surgery of the Kidney, and an important discussion is anticipated.

THE CASE OF FREDERICK MARSHALL.

THE *St. James's Gazette* is mistaken in supposing that because Frederick Marshall has been sent to Broadmoor as a "lunatic" he is placed there for life without trial. The prisoner is only in the position of an accused person under remand until such time as he can "plead" to the charge against him. If he should recover, he will be put on his trial. If not, he will remain under remand. He could not be better placed in any asylum in the country, and he will be most justly and humanely cared for by those to whose custody he is entrusted. While he is insane he cannot possibly plead "guilty" or "not guilty" to an indictment which is simply suspended—not either quashed or adjudicated upon.

HOSPITAL ELECTIONS.

THE principle of purity of election has just been successfully asserted at the Royal Alexandra Hospital for Sick Children at Brighton. A vacancy having occurred in the office of hourse-surgeon, fourteen candidates applied. The medical committee sent up to the committee of management the names of three, and recommended one of the three (Mr. Morgan) for selection, he being, in their opinion, the candidate possessing the highest testimonials. The committee of management elected Mr. Morgan. This result redounds greatly to the credit of the majority who voted for him. Mr. Morgan was a perfect stranger, and was not indebted in any way to local influence or patronage for his success. If local institutions generally adopted the above principle, there would always be a plentiful supply of highly qualified candidates for vacant offices. Mr. Morgan was a student of Charing-cross Hospital, where he greatly distinguished himself.

DR. KLEIN ON THE CHOLERA BACILLUS.

AT the meeting of the Royal Society on Thursday last Dr. Klein read a paper on the Relation of Bacteria to Asiatic Cholera, and showed clearly that the "comma bacillus" of Koch does not behave differently in cultivation from the similarly shaped organisms found by Lewis in the mouth and by Deneke in cheese. On many other points—e.g., as to the presence of the organisms in the intestinal mucosa, the action of acids upon their development, &c.—Dr. Klein has arrived at results entirely opposed to those of Koch; and he explains some of these divergences by the difference in time at which the post-mortem examinations have been made. The English Commission made the examinations as early as possible after death, and found that the "comma bacilli" increased in number *pari passu* with the length of time that elapsed between death and the examination. We must defer fuller notice of Dr. Klein's paper till next week.

THE PROPOSED TEACHING UNIVERSITY FOR LONDON.

THE second meeting of the members of the Association for promoting a Teaching University was held on Thursday, the 5th inst., at the Society of Arts, and an Executive Committee was appointed to reconsider the report issued by the provisional committee, to enter into negotiation with the different representative bodies, and to ascertain how far the authorities of the existing University of London were prepared to adopt the main suggestions of the Association. Lord Rosebery has consented to succeed Lord Reay as Chairman of the Association. The Committee includes, amongst others, Professor Marshall, and Drs. Ord, Pye-Smith, and Norman Moore.

CORPORAL PUNISHMENT ON BOARD TRAINING SHIPS.

IN reference to the complaint of excessive corporal punishment of boys on board the *Northumberland*, the following letter has been received from Sir Thomas Brassey, M.P., Secretary to the Admiralty, in answer to a communication from the Society for the Prevention of Cruelty to Children:—

"Admiralty, Whitehall, Jan. 29th, 1885.

"DEAR SIR,—In reply to your letter of the 2nd inst., I have to state that the circumstances have been investigated, and that steps have been taken to prevent the recurrence of the frequent caning of boys which has occurred on board the *Northumberland*.—Most faithfully yours,

(Signed) "THOMAS BRASSEY.

"Dr. D. Buxton, Secretary, London Society for the Prevention of Cruelty to Children, 7, Harper-street, Bloomsbury, W.C."

AT the usual meeting of the Metropolitan Asylums Board on the 31st ult., a letter from the Admiralty was read, stating that if the managers wished to keep the ships *Atlas* and *Endymion*, which were lent some years ago by the Admiralty on an emergency to meet the outbreak of infectious disease, they must be paid for, the *Atlas* being valued at £3400 and the *Endymion* at £6500. It was unanimously resolved that an answer be sent to the effect that the managers would purchase the vessels; but that, having regard to the fact that the managers were the administrators of poor rates, they would be glad if the Admiralty could see their way, after further consideration of all the circumstances of the case, to reduce the amounts named.

AT the request of the committee formed for the establishment of a British Hospital at Port Said, who met for the first time on the 31st ult., Lady Strangford has issued an appeal for funds for building purposes. A site for the hospital was given some years ago; a plan, suited to the climate, of a compact, one-storeyed building, to hold forty beds, has been approved; the furniture, linen, &c., are on the spot waiting to be used; and, most important of all, a sufficient income for the maintenance of the hospital is secure. All that is needed is money for the structure itself. The object is a good one, and we trust that Lady Strangford's request for assistance will not be made in vain.

THE front page engraving of the *Animal World* for Feb. 1st depicts the inside of the accident ward of Charing-cross Hospital, and Mr. Dodson, the house-surgeon, engaged in bandaging the leg of the injured dog, whose sagacity was a theme of comment, a short time ago, in almost every newspaper in the kingdom.

WE have great pleasure in calling the attention of our readers to the resolutions passed at a meeting held on the 15th ult., and reported on another page, in reference to the proposal to mark, by a suitable memorial, public and professional appreciation of the important services rendered by Dr. Maclean, C.B., during his tenure of the chair of Military Medicine at Netley, a post which he is about to vacate.

THE *Opinione*, the leading journal in Rome, announces that on the 1st inst. an illustrious guest *(ospite illustre)*, in the person of the celebrated English naturalist, Prof. T. H. Huxley, President of the Royal Society of London, assisted at that day's sitting of the Royal Academy of the Lincei, of which he is Corresponding Fellow.

THE *Demerara Daily Chronicle* records the death, on December 27th, of Dr. Cameron of Georgetown. The deceased was health officer of the port, chairman of the Board of Poor-law Commissioners, and health officer of the city, and was greatly respected in the colony, where he had practised for over a quarter of a century.

DR. EUGÈNE BODICHON, known chiefly in connexion with his efforts to bring into notice the febrifuge qualities of the Eucalyptus globulus, died on the 28th ult. at Algiers, aged seventy-four.

PROFESSOR GUIDO BACCELLI has been elected President of the Royal Academy of Medicine of Rome.

AT Hull on the 2nd inst., a man was fined forty shillings and costs for having exposed his son whilst suffering from small-pox.

ARMY MEDICAL SCHOOL AT NETLEY.

THE winter session of the Army Medical School terminated on the 2nd inst., when the prizes were distributed before a large company assembled in the lecture-room of the Royal Victoria Hospital, Netley. The War Office was represented by Dr. Crawford, LL.D., Director-General of the Medical Department of the Army; and the India Office by Sir Joseph Fayrer, K.C.S.I., Physician to the Council of India. At the invitation of the Senate of the School, Sir James Paget, F.R.S., presented the prizes to the successful competitors.

The names of the surgeons on probation who passed successfully through the course of special instruction for the medical departments of the British and Indian services, a list of whom will appear in our next, were read by Surgeon-General Longmore, C.B., together with the reports of the results of the examinations, intended for the information of the Secretaries of State for War and India.

Sir James Paget then distributed the awards, accompanying each with appropriate remarks to the recipient, and afterwards delivered an eloquent address to the young military surgeons, which occupied half an hour, and was listened to throughout with the most marked attention by the whole assembly. The text of the discourse may be said to have been a survey from a civilian's point of view of an army surgeon's professional career and responsibilities under the peculiar circumstances incidental to military life, especially when on active service in the field, and a comparison between them and the career and responsibilities of a surgeon in a large sphere of civil practice. A hope was strongly expressed by many present that Sir James Paget would consent to his address being hereafter published *in extenso*.

The Director-General, after a few well-chosen remarks on the address delivered by Sir James Paget, added his congratulations and best wishes to the young surgeons who were just entering the ranks of the public service. The business of the session was then closed, and the company were subsequently entertained at luncheon by the principal and other medical officers in the spacious mess-room of the officers' quarters in the hospital.

THE MACLEAN MEMORIAL.

AT a meeting held on the 15th ult., at the residence of Surgeon-General Sir Joseph Fayrer, K.C.S.I., the following resolutions were unanimously adopted:—

1. Proposed by Director-General T. Crawford, M.D., and seconded by Deputy Surgeon-General J. A. Marston: "That a representative committee, composed of members of the Public Medical Services, be formed for the purpose of taking steps to mark by a suitable memorial their high appreciation of the distinguished services of Professor W. C. Maclean, C.B., M.D., on the occasion of his retirement from the chair of Military Medicine in the Army Medical School at Netley."

2. Proposed by Surgeon-General Sir Joseph Fayrer, K.C.S.I., seconded by Surgeon-General W. A. Mackinnon, C.B.: "That the following gentlemen be requested to act as a provisional committee for the purpose of carrying out the foregoing resolution, with power to add to their number: Surgeon-General Sir Joseph Fayrer, K.C.S.I., Bengal Medical Service (retired); Surgeon-General Sir W. Guyer Hunter, K.C.M.G., Bombay Medical Service (retired); Surgeon-General W. A. Mackinnon, C.B., Army Medical Staff; Inspector-General of Hospitals H. Macpherson, Bengal Medical Service (retired); Inspector-General J. D. Macdonald, F.R.S., Naval Medical Service; Deputy Surgeon-General J. A. Marston, Army Medical Staff; Surgeon-Major J. L. Paul, Madras Medical Service; Brigade Surgeon H. Cayley, Bengal Medical Service; Fleet-Surgeon Walter Reid, Naval Medical Service; Surgeon-Major K. McLeod, Bengal Medical Service; Secretary and Treasurer—Surgeon-Major K. McLeod; Bankers—Messrs. Grindlay and Co., 55, Parliament-Street, London, S.W."

3. Proposed by Surgeon-General W. A. Mackinnon, C.B., seconded by Brigade Surgeon H. Cayley: "That the amount of subscription be limited to £1 1s."

4. Proposed by Surgeon-General Sir Joseph Fayrer, K.C.S.I., seconded by Surgeon-Major K. McLeod: "That the proposed memorial take the form of a portrait of Professor

Maclean, to be hung on the walls of the Netley Hospital, and that, if funds permit, a replica of the portrait be presented to Mrs. Maclean."

WILLS OF MEDICAL MEN.

THE will and codicil of Thomas Wright, M.D., F.R.S., late of 4, St. Margaret's-terrace, Cheltenham, Gloucestershire, who died on Nov. 17th last, has been proved by Thomas Lawrence Wright, the son, Joseph Wethered, and William Henry Paine, M.D., the executors, the value of the personal estate in the United Kingdom exceeding £25,000. The testator makes special gifts to each of his children, including the house and premises, 4, St. Margaret's-terrace, to his said son, and there are legacies to his sons-in-law and to a servant. One-third of the residue of his property he leaves to his said son, and one-third upon trust for each of his daughters, Mrs. Wethered and Mrs. Wilcox.

The will of Joseph Luke, M.D., late of Oak Lodge, Green-lanes, Finsbury-park, who died on the 22nd of October last at Hastings, has been proved by Robert M'Clure and Charles Frederick Elsten, the acting executors, the value of the personal estate amounting to over £8000. The testator leaves all his property upon trust for his wife for life, and then for his five children.

The will of Andrew James Scott, M.D., formerly Surgeon in the Madras Army, and of Tiverton, Devon, but late of 4, Anglesea-terrace, St. Leonards, who died on October 21st last, has been proved by William Collier Angove, Mrs. Emma Scott, the widow, and Captain William Augustus Scott, the son, three of the executors, the value of the personal estate exceeding £6800. The provisions of the will are in favour of the testator's wife and daughters and his said son and his children.

The will of John Dan Brown, M.D., late of Rochester, Kent, who died on October 23rd last, has been proved by Arthur Tresco Franklyn Brown, Physician and Surgeon, the son and sole executor. Subject to a legacy to his housekeeper, the testator leaves all his real and personal estate to his said son.

The will of Charles Blakeley Brown, M.D., late of 3, Hill-street, Berkeley-square, who died on October 22nd last, has been proved by Mrs. Emila Brown, the widow and sole executor, the value of the personal estate amounting to over £15,000. The testator devises and bequeaths all his real and personal estate to his wife absolutely.

The will and codicil of Edward Thomas Roe, M.D., late of 18, Kensington-crescent, who died on September 28th last, was proved on the 18th ult. by William Hobbs, the sole executor, the value of the personal estate exceeding £4400. The testator leaves all his furniture and effects and an annuity of £200 to his wife, Mrs. Sarah Roe, and the residue of his property to his two daughters.

The will and two codicils of Mr. James Alexander Guise, Inspector-General of Hospitals, retired, late H.M. Bengal Medical Service, formerly of Elm Grove, Elgin, Scotland, but late of The Knoll Leigh Woods, Long Ashton, Somersetshire, who died on October 4th last, were proved on December 23rd last by Charles Guise, the brother, John Fullerton Beatson, M.D., C.I.E., and Miss Mary Ann Georgina Guise, the daughter, the executors, the value of the personal estate exceeding £4000. The testator leaves legacies to his executors and an annuity to his brother, Francis George. The residue of his property is to be held in trust for his wife, Mrs. Mary Jane Guise for life, then for his daughter, Mary Ann Georgina, so long as she shall remain unmarried, and then for his said daughter and his son, James John.

The following legacies have recently been left to hospitals and other medical institutions:—Mr. Benjamin William Benson, of 2, St. Leonards-terrace, Chelsea, £100 to the London Hospital, Mile-end-road; Mr. Edmund Burke, of 85, Avenue-road, Regent's-park, Barrister-at-Law, £500 to the Cottage Hospital, Walsall, near Birmingham; and Mrs. Elizabeth Lewis, of Nightingale Villa, Clevedon, all her shares and interest in the Clevedon Gaslight Company to the Clevedon Dispensary, and all her shares, stock, and interest in the Clevedon Waterworks Company to the Clevedon Cottage Hospital.

VITAL STATISTICS.

HEALTH OF ENGLISH TOWNS.

IN twenty-eight of the largest English towns 6020 births and 4188 deaths were registered during the week ending the 31st ult. The deaths showed an increase of 96 upon the number returned in the previous week, and were equal to an annual rate of 24·5 per 1000 of the estimated population of these towns in the middle of this year, against 24·2 and 24·0 in the preceding two weeks. During the first four weeks of the current quarter the death-rate in these towns averaged 24·4 per 1000, against rates declining from 27·7 to 21·1 in the corresponding periods of the six years 1879–84. The lowest rates in these towns last week were 13·5 in Birkenhead, 17·6 in Salford, 18·0 in Derby, and 19·0 in Hull. The rates in the other towns ranged upwards to 30·2 in Plymouth, 32·7 in Preston, 34·9 in Cardiff, and 36·6 in Norwich. The deaths referred to the principal zymotic diseases in the twenty-eight towns, which had been 370 and 372 in the previous two weeks, further rose to 396 last week; of these 141 resulted from whooping-cough, 58 from measles, 56 from scarlet fever, 43 from "fever" (principally enteric), 35 from diphtheria, 32 from diarrhœa, and 31 from small-pox. The lowest death-rates from these diseases, in the aggregate, were recorded last week in Derby, Brighton, and Nottingham; and the highest in Preston, Sunderland, Norwich, and Cardiff. The greatest mortality from whooping-cough occurred in Bradford and Norwich; from measles in Sunderland and Cardiff; from scarlet fever in Newcastle-upon-Tyne and Halifax; and from "fever" in Preston and Norwich. The 35 deaths from diphtheria in the twenty-eight towns included 15 in London, 4 in Liverpool, 2 in Nottingham, 2 in Bradford, and 2 in Cardiff. Small-pox caused 60 deaths in London and its outer ring of suburban districts, and 2 in Liverpool. The number of small-pox patients in the metropolitan asylum hospitals situated in and around London, which had been 1009 and 1092 on the preceding two Saturdays, further rose to 1147 at the end of last week; the admissions, which had been 216 and 287 in the previous two weeks, were 263 last week. The Highgate Small-pox Hospital contained 97 patients on Saturday last, 22 having been admitted during the week. The deaths referred to diseases of the respiratory organs in London, which had been 609, 552, and 513 in the preceding three weeks, rose again to 556 last week, and were 16 above the corrected weekly average. The causes of 105, or 2·4 per cent., of the deaths in the twenty-eight towns last week were not certified either by a registered medical practitioner or by a coroner. All the causes of death were duly certified in Portsmouth, Leicester, Derby, Norwich, and Plymouth. The largest proportions of uncertified deaths were registered in Oldham, Sheffield, and Huddersfield.

HEALTH OF SCOTCH TOWNS.

The annual rate of mortality in the eight Scotch towns, which had steadily declined from 30·7 to 28·5 per 1000 in the preceding four weeks, rose again to 30·2 in the week ending the 31st ult., and exceeded by no less than 5·7 the mean rate during the same week in the twenty-eight large English towns. The rates in the Scotch towns last week ranged from 21·4 and 22·0 in Edinburgh and Leith, to 33·7 in Glasgow, 34·9 in Perth, and 41·9 in Dundee. The 738 deaths in the eight towns included 28 which were referred to whooping-cough, 23 to measles, 20 to diarrhœa, 11 to scarlet fever, 9 to "fever" (typhus, enteric, or simple), 7 to diphtheria, and not one to small-pox; in all, 98 deaths resulted from these principal zymotic diseases, against 83 and 86 in the preceding two weeks. These 98 deaths were equal to an annual rate of 4·0 per 1000, which was 1·7 above the mean rate from the same diseases in the twenty-eight English towns. The 28 deaths from whooping-cough showed a further slight decline from the numbers in recent weeks, and included 15 in Glasgow, 3 in Edinburgh, and 3 in Leith. The 23 fatal cases of measles were fewer by 3 than the number in the previous week; 12 occurred in Glasgow and 10 in Dundee. The 20 deaths attributed to diarrhœa showed an increase upon recent weekly numbers, and were 8 above the number in the corresponding week of last year. They included 7 in Glasgow and 5 in Dundee. The fatal cases of scarlet fever and of diphtheria showed an increase; 7 of scarlet fever and 5 of diphtheria were returned in Glasgow. The 9 deaths referred to "fever," of which 5 occurred in

Glasgow, corresponded with the number in the previous week. The deaths attributed to acute diseases of the respiratory organs in the eight towns, which had ranged from 203 to 196 in the preceding four weeks, rose to 214 last week, and exceeded by no fewer than 123 the number returned in the corresponding week of last year. The causes of 86, or nearly 12 per cent., of the deaths in the eight Scotch towns last week were not certified.

HEALTH OF DUBLIN.

The rate of mortality in Dublin, which had been equal to 31·0 and 31·9 per 1000 in the preceding two weeks, further rose to 35·5 in the week ending the 31st ult. During the first four weeks of the current quarter the death-rate in the city averaged 32·4 per 1000, whereas the mean rate during the same period did not exceed 24·0 in London and 23·9 in Edinburgh. The 240 deaths in Dublin last week showed a further increase of 24 upon the high numbers in recent weeks; they included 22 which were referred to the principal zymotic diseases, against 23 in each of the previous two weeks. Of these 22 deaths, 9 resulted from fever, 5 from whooping-cough, 3 from measles, 3 from scarlet fever, 2 from diarrhœa, and not one either from small-pox or diphtheria. These deaths were equal to an annual rate of 3·3 per 1000, the rate from the same diseases last week being equal to 2·1 in London and 1·9 in Edinburgh. The 9 deaths referred to "fever" exceeded the number returned in any recent week, and the 5 from whooping-cough also showed an increase; the fatal cases of scarlet fever, measles, and diarrhœa had declined. Two inquest cases and 2 deaths from violence were registered in the city; and 79, or more than a third, of the deaths were recorded in public institutions. The deaths both of infants and elderly persons showed a considerable increase last week. The causes of 20, or more than 8 per cent., of the deaths in the city last week were not certified.

THE SERVICES.

THE post of Principal Medical Officer, South-Eastern District, which has been vacant since the retirement on the 15th July last of Deputy Surgeon-General W. Stewart, has been temporarily filled by Brigade Surgeon George Langford Hinde; Deputy Surgeon-General R. Wolseley, Sanitary Officer, Aldershot Division, has been appointed Principal Medical Officer, North British District, Edinburgh; Deputy Surgeon-General W. Skeen has been appointed Principal Medical Officer to the troops stationed in the Cork District.

WAR OFFICE.—Army Medical Staff: Surgeon John Buxton, M.B., half-pay, has retired from the Service, receiving a gratuity; Surgeon William Maunsell-Collins, M.D., retires from the Service, receiving a gratuity; Brigade Surgeon W. C. Boyd has been granted retired pay, with the honorary rank of Deputy Surgeon-General; Surgeon-Major R. W. Forsayeth has been placed on retired pay, with the honorary rank of Brigade-Surgeon; Surgeon-Major Robert Hyde has retired from the Service on retired pay, with the honorary rank of Brigade Surgeon.

INDIA OFFICE.—The Queen has approved of the transfer to the half-pay list of Surgeon-Major Theophilus Bolton Wright Plunkett Johnston, of the Bombay Medical Establishment.

ADMIRALTY.—The following appointments have been made:—Staff Surgeon James Dear Smith, M.D., to be Fleet Surgeon in Her Majesty's Fleet; Deputy Inspector-General Michael W. Cowan, M.D., to Bermuda Hospital; Surgeon Samuel Johnson, M.B., to the *Ranger;* Surgeon Francis G. Wright, to the *Asia;* Surgeon W. Eames, to the *Grappler;* Surgeon John L. Aherne, B.A., to the *Sultan.*

ARTILLERY VOLUNTEERS.—2nd East Riding of Yorkshire: Lieutenant Frederick Richard Chapman, M.B., is appointed Acting Surgeon.

ENGINEER VOLUNTEERS.—1st Gloucestershire: Surgeon George Adams resigns his commission; but is permitted to retain his rank, and to continue to wear the uniform of the corps on his retirement.

RIFLE VOLUNTEERS.—1st Cambridgeshire: Acting Surgeon George Edward Wherry, M.B., resigns his appointment.

THE HOSPITALS ASSOCIATION.—The first annual meeting of this Association is to be held on March 11th, when Sir Andrew Clark, Bart., M.D., will preside.

Correspondence.

"Audi alteram partem."

HARVEY'S MANUSCRIPT LECTURES.

To the Editor of THE LANCET.

SIR,—The MS. of the original lectures at the Royal College of Physicians by William Harvey, including his earliest observations on the heart and circulation, and delivered by him in and after 1616, were rediscovered in the British Museum in 1877. I gave a description of the little book, and exhibited an autotype copy of one page in my Harveian oration at the College in 1877. I then suggested that it would redound to the honour of the present generation, and be an advantage to the history of medicine, if the whole of the lectures could be published in autotype, accompanied by an intelligible transcript. The handwriting is so crabbed, and there are so many abbreviations, that no one but an expert could succeed in understanding them. Without the valuable aid of Mr. Bond, now the chief of the British Museum, I should have failed in my attempts to understand much, if anything, of the lectures. By dint of severe labour Mr. Bond succeeded in interpreting one of the lectures, and has now been good enough to make me acquainted with a gentleman who will undertake to transcribe the whole of the lectures. My inquiries lead me to believe that no publisher could be found to undertake the risk of publication in the form proposed, unless guaranteed a certain amount of professional support. On the other hand, I calculate that if from two to three hundred gentlemen would engage to each take a copy at a price not exceeding two guineas, the work might be safely proceeded with. Autotyping is a much more expensive process than ordinary printing, and the honorarium to the transcriber would necessarily add considerably to the cost.

May I ask your permission to submit the question to my professional brethren through your journal whether they will aid in this labour of love of, and admiration for, our great prototype of the scientific physician? I am permitted to state that the Presidents of the Royal Colleges of Physicians and Surgeons warmly support the undertaking.

I am, Sir, your faithful servant,

EDWARD H. SIEVEKING, M.D.

17, Manchester-square, W., Feb. 2nd, 1885.

P.S. Any communications on the subject may be addressed to me, or to Messrs. Churchill, 11, New Burlington-street, W.

CONGENITAL DISLOCATIONS OF THE HIP.

To the Editor of THE LANCET.

SIR,—In his inaugural address,[1] Professor Bennett has alluded to some work of mine in connexion with congenital dislocations, and thinks he has proved that any theory I have advocated "falls to the ground." Contrary to the usual course, Dr. Bennett has in his address discussed a single topic, and has selected this one "by the accident of obtaining a recent specimen of congenital dislocation of the hip." This was taken from a child, six years of age, in whom there was "no evidence of arrest of development as the cause of dislocation." "In discussing the subject his object was to revive the knowledge of what had conferred great honour on the profession of this city (Dublin), and to point out that the pathological facts recorded by his predecessors in the Surgical Society had been too much ignored, notably Hutton's demonstration of the true position of the head of the femur."

In the year 1835, Dr. Hutton[2] brought the case alluded to, of John N——, aged thirty-one, who "had always been an idiot," before the Medical Section of the British Association in Dublin. There was discovered "a remarkable deficiency of development in the right hemisphere of the brain; a great part of the right hemisphere was deficient, and a serous cyst, filled with limpid fluid, five inches in length and between two and three in its transverse diameter, occupied the hiatus." Moreover, there was dislocation of the left hip, together with atrophy of the limb, and contraction and atrophy of the left upper extremity, with sub-

[1] The Dublin Journal of Medical Science, January, 1885.

[2] The Dublin Journal of Medical and Chemical Science, vol. viii., 1836.

luxation of the radius and deformity of this bone and of the bones of the carpus. The whole limb was atrophied, and the forearm was permanently flexed on the arm. These are the cases on which Dr. Bennett founds his argument. He reviews, cursorily, the theories of Dupuytren, and those of Ammon, Cruveilhier, Chelius, Stromeyer, and South, and does not agree with any of them. He writes thus, "The last theory I purpose mentioning is one which has been strongly supported by Mr. South—namely, that the deformity was due to abnormal delivery, to breech presentation of the fœtus, and to force during delivery by the hook or other means applied upon the flexure of the thigh." And he thinks that "the most important theory is that of Guérin—namely, that during fœtal existence some irregularity of nerve action occurred, and the muscles in particular groups became affected for the time spasmodically. Whatever the change was, whether spasmodic action of muscle or simple disorganisation of muscle of any kind, it was followed by retraction of the muscle." And upon this he says, "I assume as the first point that congenital dislocation of the hip, of the shoulder, and of the elbow, and congenital club-foot are all deformities of the same class." And again, "The congenital dislocation of the hip is a single dislocation, varying in degree but not in kind."

Now, I have endeavoured elsewhere to show that congenital dislocations may be divided into two classes—viz., those connected with some abnormality or monstrosity (and these are for the most part subluxations), and dislocation of the head of the femur upwards and outwards, which is not uncommon, and which occurs without other abnormality. I have had forty of these cases under my care, of which thirty-one were double and nine were single dislocations; and, so far as I have been able to learn, with one exception only, all occurred in preternatural labours. The other was the result of violence immediately after birth.

After I had given some attention to this subject, I saw three cases with Dr. Tyler Smith. They all had the peculiar lameness of congenital dislocation, and he told me that all occurred in breech presentations, and that he had assisted the birth with the finger or with the hook in the flexure of the thigh. In these and in other similar cases he had heard a click after making traction, but he did not explain it to himself. In such cases I have never seen anything which would denote spasm; nor in such cases have I met with talipes or other distortion except in one instance. In this case a boy had congenital dislocation of the left femur and double varus; one of his sisters had double dislocation, and the other had dislocation of the right femur. Neither of the sisters had any other abnormality. The mother's pelvis was deformed, and she died in giving birth to a fourth child.

It will be remarked that Dr. Bennett says of his case, a girl six years of age, that there was "no evidence of arrest of development as the cause of dislocation." And he adds that he "was struck with the destruction of the fibres of the gluteus maximus muscle—indeed, they had almost disappeared in places." Now, because there was no arrest of development, dislocation must have occurred through violence, and the violence must have been such as to rupture the fibres of the gluteus maximus. Dr. Bennett thinks that there is no proof of external violence, but that displacement is caused by intra-uterine spasm. Did anyone ever hear of such intra-uterine spasm as to rupture the gluteus maximus? Even Guérin never proposed such a theory. That has been left entirely for Dr. Bennett, and I doubt if anyone will contest the honour of the discovery with him.

With regard to the second case (Dr. Hutton's), it is obvious that it does not enter into the category. I know the preparation, and believe it to be a case of hemiplegia, with subsequent displacement. But whether it is so or not, it is scarcely such a case as should be selected to show "the true position of the head of the femur" in congenital dislocation—a hemiplegic idiot of thirty-one years.

Dr. Bennett thinks that the operation which I proposed, and have frequently done, is "a possibility," but "rather a large order." To anyone who is in the habit of operating, it is simple enough; it may seem terrible to others. The last operation of this kind that I performed was done nine weeks ago. The head of the bone is now well fixed in the acetabulum, and the child can raise the limb easily from the couch. Also, she can stand without apparatus, and can walk. I should be delighted to show this case to Dr. Bennett. It is said that one fact is worth a hatful of theory. I hope I may persuade Professor Bennett that my facts are worth more than his theory.

Yours obediently,

Grosvenor-street, Jan. 29th, 1885. B. E. BRODHURST.

HEMIANÆSTHESIA FROM CONGENITAL BRAIN DISEASE.

To the Editor of THE LANCET.

SIR,—In an annotation which appears under the above title in your last issue with reference to a case which I brought before the last meeting of the Clinical Society, it is stated that the title of my paper could only be justified on the *lucus a non lucendo* principle; and that no evidence had been forthcoming that the affection was congenital. As this statement is not in consonance with the facts of the case, I must ask you to allow me to mention that I expressly stated at the meeting, in reply to a question from Dr. Adeney, that a full history of the case had been given to me by the father of the girl, a very intelligent man. It was to the effect that the primary cause of the child's illness had by her medical attendant been pronounced to be (I am now quoting the *ipsissima verba* from a letter of the girl's father to me, dated April 24th, 1884) "a paralytic seizure at or immediately after birth, *which has affected her left side ever since*, and is more noticeable in her left arm than in her left leg." This seizure was also considered to be the cause of the epileptic fits, from which she had suffered at intervals ever since birth. When she was about twelve months old she was taken to Dr. Russell Reynolds and Sir James Paget, and the former of these gentlemen expressed the opinion that the child could not be expected to talk until it was six or seven years of age.

I trust that these details will satisfy you and the writer of the paragraph in question that the case was really one of congenital brain disease, and not, as he avers, one of functional or hysterical hemianæsthesia. If I had thought it to be one of the latter kind I should not have brought the case before the Society, as I consider that subject to be thoroughly threshed out. My case was, however, one of an entirely different nature, and also a most unusual and exceptional one. For this reason there may naturally be differences of opinion with regard to the localisation of the lesion, and the remarks of Dr. Angel Money were very much to the point in this respect; but that there was really a cerebral lesion, produced at or immediately after birth, cannot for an instant be doubtful. Moreover, if the affection had been hysterical, there would most probably have been the usual phenomena of transfer after the application of electricity, which was not the case.

I am, Sir, your obedient servant,

Harley-street, W., Feb. 1st, 1885. JULIUS ALTHAUS, M.D.

*** Our difficulty in adopting Dr. Althaus' view presents itself in the following light:—If the morbid symptoms which lasted for eleven years without variation depended on a coarse lesion of the brain, and if the case were cured, then it is clear that electricity can get rid of the effects of very chronic organic brain disease—a position which we prefer not to accept until substantiated by post-mortem experience.—ED. L.

THE UNIVERSITY OF LONDON.

To the Editor of THE LANCET.

SIR,—At a recent meeting of Convocation I see that Dr. Curnow moved, and Mr. Christie seconded, "The desirability of holding the preliminary scientific examination twice a year." Could not a proposition somewhat similar in character, but more comprehensive, be carried applying in like manner to all the examinations up to and including those for the degree of Bachelor in all the faculties? This would be a great boon to medical students whose degrees are not ornamental titles, but essential to the practice of their profession. Another point or two also may be considered with advantage to them:—1. Whether the four years of medical study required for the M.B. may not be counted from any time after having been registered as a student of medicine, before or after matriculation, and not, as now, divided into two fixed periods between each examination. 2. The desirability of dividing the subjects of some of the examinations into parts, or if the candidate pass in a certain number of them—say a half—let such subjects be allowed him at any subsequent examination, he not being then permitted to compete for honours. The examinations are so numerous and so severe that some means might reasonably be carried out

to hold them more than once a year, and also to remove those arbitrary periods of study between each examination. If the university should still continue to act as an examining board only, might not something be done to improve the position of those who matriculate by giving them some designation, such as "L.A."—Licentiate in Arts? This examination is acknowledged to be the most severe of its kind, and is also the Arts examination for degrees in Medicine, Law, and Science. If such a designation were granted, no doubt a very much larger number of candidates would come forward than at present. Many of those who pass it never intend going further, and take the examination merely as evidence of a good general education, but find that, without some such designation, it is of little use to them in after-life.

I am, Sir, yours, &c.,

Jan. 11th, 1885. M.D.

THE NEW SCOTTISH CONJOINT EXAMINATIONS.

To the Editor of THE LANCET.

SIR,—As your columns are always open to correspondents who aim at exposing abuses of medical examinations, I would like to make a few remarks on the new Scottish Conjoint Scheme of Examinations, from which great things were hoped for by the friends of the Scottish corporations.

At the first professional examination just concluded, many of the candidates, who were allowed to pass by the so-called just and conscientious examiners, practically knew nothing of their work, and would not have been allowed to pass by any licensing board in England or Ireland. Four candidates I know of actually were advised not to think of presenting themselves, as there was not the slightest chance of their passing, yet every one of these four men entered, and *passed*. It is a well-known fact that in the written part of the examinations wholesale "cribbing" is practised, the candidates being allowed to sit where they like, and they take the advantage of arranging beforehand beside whom they are to sit. These things must be known to the examiners, and yet not the slightest effort is made to prevent their occurrence. The second and final examinations are certainly conducted with ordinary severity, so far at least as the oral and practical parts are concerned; but even in these important examinations the written part of the test is merely a farce, owing to the help given by one candidate to another. It is indeed time that the system of visiting examinations, particularly in Edinburgh (it is not unnecessary even at the university), should be regularly and strictly carried out.

I am, Sir, yours, &c.,

Edinburgh, Jan. 19th, 1885. M.D., F.R.C.S. Edin.

NORTHERN COUNTIES NOTES.

(From our own Correspondent.)

THE WEATHER AND MORTALITY IN THE NORTH.

SITUATED as we are in the narrowest part of England, and between two seas, we are well accustomed to change of weather; but the present winter has been so far one of the most changeable on record, and is noteworthy, if not for its severity, at least for its variableness. There has been no great amount of disease, and we cannot say that the aggregate mortality has been increased; still there has been some influence very deadly to aged persons within the last few weeks, and our newspaper obituary has been remarkable for the great ages recorded. This mortality in the aged has been observed to be coincident with thermometric changes, sometimes as much as ten and fifteen degrees between two days.

THE HELM WIND.

Attention has been called in the press to the remarkable manifestations of the phenomenon known as the helm wind, which was observed in Carlisle and its neighbourhood on the 16th and 17th ult. It was noticed as a dark-coloured cloud resting like a cap upon a portion of the Pennine range of mountains between Crossfell and the Croglin Fells, the broken fragments of clouds being driven with great speed from the east; the rustling noise of the wind, which resembled the roaring of a heavy sea when it breaks upon a rocky shore, and the lifting force and whirling sensation peculiar to this wind, being very marked. This remarkable wind is confined to this district of England, and its lifting force is such as to sometimes overturn vehicles and animals caught in its course, which seldom extends beyond seven miles from where it originates. Sometimes there is a second cloud, called the "helm burr," further back and higher than the ordinary beautiful bar, but it was not observed on the late occasion. The Royal Meteorological Society is now obtaining facts, and the results of observations in the various districts where the "helm" blows, which cannot fail to prove of interest when published.

NEWCASTLE LYING-IN HOSPITAL.

The annual meeting of governors was held last week, Dr. Gibson of our city occupied the chair. The report of this useful charity showed that 359 cases had been attended during the past year, and considering the prevalent distress, and that the cases would be among the extreme poor, it is satisfactory to hear that throughout the year there had not been a single fatality.

NEWCASTLE THROAT AND EAR HOSPITAL.

The annual meeting of this charity was held on Monday last, the Bishop of Hexham and Newcastle presiding. The report showed that about 1600 patients had been admitted to the benefits of the institution during the year, being an increase of 400 over the previous year; 673 had been treated gratuitously, while the important amount of £208 had been contributed by voluntary offerings of patients. The institution is quite free from debt, but its increasing popularity renders it necessary for the governors to take steps for its early enlargement.

THE NEWCASTLE INFIRMARY.

The question of the enlargement of the infirmary on its present site or the erection of a building on a new site may now be regarded as settled by the compromise unanimously agreed upon at the late court of governors, in the following terms:—"That the question of the extension of the present infirmary by the erection of a permanent wing be abandoned, and that a temporary wooden building be erected in the garden, at a cost of about £2000;" and, "It being apparent that the time has arrived when the Newcastle-upon-Tyne Infirmary should be removed to a more salubrious situation, the special committee be empowered to negotiate for a new site suitable for the erection of a hospital capable of accommodating 300 or more patients, to be designed in accordance with the latest and most approved principles of hospital accommodation, obtained by open and public competition; to prepare the necessary instructions for designs and plans, and to take steps to obtain the funds necessary for the undertaking." To the speedy and unanimous action of the medical staff the public are indebted for this satisfactory aspect of the question; and yet, to an outsider, it does appear a pity that £2000 and more should have to be spent on a temporary wooden building.

TYPHOID FEVER AT WOLSINGHAM.

A very serious outbreak of typhoid fever has taken place at Wolsingham, in the adjoining county of Durham. Wolsingham is a manufacturing and mining town of about 7000 population. The staple trade is iron and steel, and it is principally among the workers that the epidemic prevails. Over sixty cases are reported so far.

Newcastle-on-Tyne, Feb. 4th.

IRELAND.

(From our own Correspondent.)

BELFAST ROYAL HOSPITAL.

A SPECIAL MEETING of the Corporation was held last week for the purpose of considering the resolution upon religious registration adopted by the Board of Management on the 10th ult. The following was the resolution which the meeting was convened to consider: "That it be the duty of the house-surgeons and physicians to ask the following question of any patient entering this hospital, when in a condition to give an answer—'Do you wish to state your religious denomination?' If the patient expresses such a wish, the surgeon or physician shall enter the name, address, and religious denomination in a book kept for the purpose, to which all clergymen shall have access." After a very

stormy discussion, the following amendment was adopted: "That, considering the absolutely unsectarian character of the Royal Hospital, which has existed for nearly one hundred years, ministered to and supported by all parties and classes in the community, and that the system as at present administered has proved satisfactory to the Board of Management, the medical staff, and the visiting clergy, we decline to make any change in the present management."

BRITISH MEDICAL ASSOCIATION.

The annual meeting of the Dublin Branch took place on the 29th ult. The Council, in their report, referred to the great block that exists in the senior ranks of the Army Medical Department, and appointed last year a subcommittee to draw up a report on the subject. After the Council had received this, they learned that the authorities were then engaged in the consideration of impending changes in the department, and therefore deemed it opportune at such a time to take further action upon it. The Council regretted to say that since the report was received the matters referred to in it had not improved. The meeting passed a vote of thanks to Mr. Edward Hamilton for the manner in which he had performed the office of president during the past year; and the incoming President (Dr. Atthill) delivered his inaugural address on the subject of medical reform.

Dr. Barron has been presented by the students of the Belfast Royal Hospital with an address and a collection of surgical instruments, on the occasion of his severing his connexion as visiting surgeon to the hospital.

Compared with the corresponding quarter of 1883, the returns of pauperism furnished by the Local Government Board for the last December quarter show a decrease of 651 in the average number of workhouse inmates throughout Ireland on Saturdays during the quarter, and a decrease of 1187 in the average number of persons in receipt of out-door relief.

Dublin, Feb. 3rd.

BELFAST.

(From our own Correspondent.)

THE BELFAST HOSPITAL FOR SICK CHILDREN.

FROM the reports read at the twelfth annual meeting of this most popular charity we gather that during the past year there were 342 intern patients, while during the same period there were 8509 out-patients, a number which exceeds that of any previous year. The senior students attending Queen's College have, as heretofore, attended the practice of the hospital. In accordance with a rule by which a physician and surgeon retire alternately, an election was held on January 8th, on which occasion Dr. Byers was unanimously re-elected for four years as honorary attending physician. Dr. Nelson has been appointed honorary oculist. More than one hundred ladies of the committee and other friends have guaranteed to raise each £5 or more, by which a sum of at least £500 will be added to the capital of the hospital before June 1st next. This plan, it was thought, would be better than raising the money by a bazaar. Already nineteen ladies have handed in subscriptions amounting to an average of £7 each.

HOSPITAL FOR CONSUMPTION AND DISEASES OF THE CHEST.

The second annual meeting of this institution was held on January 25th. During the past year 715 new cases have been under treatment, the total number of visits paid by these patients amounting to 3611. The financial statement showed that there was a balance in the treasurer's hands of £10 15*s.* 5*d.*, and the receipts from "pay-patients" during the last year have been £37 1*s.* It is to be regretted that the funds of the institution do not as yet warrant such an increase of expenditure as would provide a few beds for cases of severe illness.

THE SAMARITAN HOSPITAL.

The annual meeting of the friends and supporters of this hospital, which is specially devoted to the "medical and surgical relief of women affected with diseases peculiar to the sex," was held on January 29th. There were 1100 patients treated during the year 1884. Of these 1016 were treated in the extern department and 84 in the wards. The number of visits made by the extern patients was 5798. The patients have contributed £250 to the funds during the year—a very interesting fact.

ULSTER EYE, EAR, AND THROAT HOSPITAL.

During the year ending December 31st last 1961 cases were under treatment; of these 100 had continued in attendance from the previous year, and 1861 were new cases. There were 223 intern patients. The committee have for several years advocated the partially self-supporting system of hospital management. Of the extern patients 1103 paid an entrance fee of one shilling, and 635 were treated free. Of the ordinary intern patients 66 were free, whilst 112 were paid for. Private wards were let to 45 private patients. During the present year senior students of the Belfast Medical School have been permitted by the acting surgeon, with the approval of the committee, to be present at operations. During the year 120 important eye operations, including 60 cataract extractions, 22 operations for squint, and 13 cases of removal of the eyeball, were performed. Three hundred and fifty-eight other operations, including the ear and throat, and minor operations on the eye, were also performed. It has been decided to appeal to the public for funds to carry out the plan of extension of the hospital as recommended by the surgeon, Dr. McKeown. He advised the addition of two day-rooms, two small wards for ear and throat cases, two small wards for contagious cases, a dormitory for an additional nurse, a dark room for oxy-hydrogen light, and open-air exercise ground.

PARIS.

(From our Paris Correspondent.)

PROSECUTION OF MEDICAL MEN IN PARIS.

A RATHER strange prosecution against four medical men was brought before the Correctional police last week by a M. Bouyer, who charged them with malpraxis, which, he stated, resulted in his being disabled for life, and claimed 20,000 francs damages. The charge was founded on the following circumstances:—The plaintiff, who was an "officier de santé," although he never practised, and edited a financial paper, assuming the title of "Dr.," applied to Dr. Piogey for advice for a wound in the hand, accidentally caused by a rusty nail about fifteen months ago. Phlegmonous inflammation having set in and gangrene threatening, Professor Trélat and Dr. Delens, two eminent surgeons, were called in consultation. These gentlemen considered it necessary to make free incision and to apply drainage-tubes, to save not only the patient's arm, but even his life, which was much endangered, as he was also diabetic. The doctors were, moreover, accused of having removed him, contrary to his will, and whilst in a state of delirium, to a "maison de santé," although it was done for his own personal advantage, his own room being in a most insanitary condition. At the "maison de santé" he received every care and attention, and Dr. Piogey, under the impression that the patient was a professional brother, placed his own nephew, who bears the same name, and who is also a physician, in constant attendance on him. The other three doctors paid him regular visits as long as necessary, and on the assumption that the patient was a *confrère*, did not make any charge for their professional services. On his recovery the patient left the "maison de santé," and his first act was to prosecute his benefactors on the charge mentioned above. A more flagrant example of ingratitude can scarcely have been recorded in medical history, and the judges, concurring with this view of the case, rebuked him, and not only did not allow him damages, but condemned him to pay 12,000 francs, to be divided equally among the four doctors.

PRIZES AT THE FACULTY AND ACADEMY OF MEDICINE.

The Faculty of Medicine of Paris has awarded the prix Châteauvillars to Dr. Constantin Paul for his work entitled "The Diagnosis and Treatment of Diseases of the Heart." The Academy of Medicine has divided that portion destined for prizes of the Morbinne legacy among the following gentlemen: Dr. A. J. Martin, 4000 francs, for his work on the "Civil Sanitary Administration in Foreign Parts and in France;" Drs. Straus and Roux, 2000 francs each, for their cholera researches at Toulon; Dr. Van Morris, of Dunkirk, 2000 francs, and to Dr. Amat, military surgeon, 500 francs, for their memoirs on the influence of sea-bathing in the treatment of scrofula in children.

FEMALE STUDENTS AS INTERNES.

The question of the admissibility or the inadmissibility of female medical students to the "internat" of hospitals has just been discussed at the Municipal Council of Paris; and although Dr. Peyron, the Director of Public Assistance, and other members pointed out in strong terms the inconvenience that would arise from the lady students having to eat and sleep in the same room with the male students, their admissibility has been voted by 48 against 25. A compromise, however, has been proposed to the effect that a separate room shall be allotted to the lady students.

UPROAR AT THE SCHOOL OF MEDICINE.

Some disturbance took place last week at the School of Medicine during Professor Robin's lecture, some of the students having resorted to the by no means commendable practice of uproarious interruptions during the discourse crying out "Your resignation!" "Go to the Senate." Professor Robin has never been very popular among the Paris medical students, as he has always been rather severe at the examinations. But this is not the only reason. I believe they simply wish to make the berth which he has occupied for more than thirty years "too hot" for him, so that he may be induced to leave it and make room for someone more in favour. Meanwhile Professor Robin's course of lectures on histology has been suspended until further orders.

Paris, Feb. 4th.

Obituary.

CHARLES CULLEDGE BALDING, M.R.C.S., L.S.A.

A LITTLE more than a year ago we noticed the fact that Mr. C. C. Balding had been compelled to retire from practice at Shefford, owing to continued ill-health; and the occasion was marked by the presentation to him of a complimentary address and testimonial, expressive of the high esteem in which he was held by those among whom he had practised since 1857. The illness from which he suffered terminated fatally on the 24th ult. It was locomotor ataxy, and for nine years he had continued to pursue his unselfish labour amongst all his patients, rich and poor, whilst suffering often from the increasing and agonising pains of that formidable disease. He deserves to be remembered for this heroic struggle against his own physical pain whilst engaged in relieving the sufferings of others. Mr. Balding was the second son of the late Mr. James Balding, of Barkway, who died at an advanced age in September, 1883. Two of his brothers, Mr. D. B. Balding of Royston and Dr. Mortimer Balding of St. Albans, are well known to the profession. All three brothers received their medical education at the Middlesex Hospital. Soon after leaving the hospital Mr. C. C. Balding in the early part of the Russian war accepted an appointment on the Army Medical Staff for service in the Crimea. He was with several personal friends detailed for duty at Eupatoria, where, owing to the failure of the British Commissariat Department, they were subjected to great privations, which told seriously on the health of himself and of those who were quartered there with him. He afterwards served at Trebizond, where he remained until the end of the war. After his return home, in somewhat impaired health, he renewed his work at the Middlesex Hospital, and subsequently, in November, 1857, commenced practice at Shefford, by succeeding to that of Mr. J. M. Layman, whose daughter Ellen he afterwards married. Here he soon gained the confidence of a wide circle, and his professional work became laborious.

The funeral took place at Campton, on Thursday, Jan. 29th. The coffin was of plain oak, and upon it were carried the Crimean medals and sword of the deceased, and numerous wreaths sent by sympathising friends. He was followed to the grave by his three sons and four brothers, and also by Mr. C. Layman (brother-in-law), and the funeral was attended by all the members of the medical profession in the town and neighbourhood, as well as by most of the principal inhabitants. The deceased leaves a widow, and family of three sons and two daughters.

We believe that an endeavour will be made to procure for one of the sons the privileges of education at Epsom Medical Benevolent College, and we cordially commend to the notice of the governors the son of so honourable and heroic a member of our profession.

WILLIAM BRAITHWAITE, M.D.

DR. WILLIAM BRAITHWAITE of Leeds, whose death occurred on the 31st ult., was born in 1807, and was consequently in his seventy-eighth year. After serving an apprenticeship to the late Mr. Thomas Teale, and afterwards to Mr. T. Pridgin Teale, Dr. Braithwaite pursued his professional studies at St. George's Hospital. He became a Licentiate of the Society of Apothecaries in 1828, a Member of the Royal College of Surgeons in 1829, and in 1860 he received the degree of M.D. from the University of St. Andrews. In 1830 he commenced practice in Leeds on his own account, and filled the posts of honorary surgeon to the Eye and Ear Infirmary and lecturer at the Leeds School of Medicine on the diseases of women. In 1840 he commenced the publication of the "Retrospect of Medicine," a work which has proved of much value to, and gained great approval from, the members of the medical profession. Dr. Braithwaite was the oldest medical practitioner in Leeds, and, on account of his professional ability and his sympathetic and kindly disposition, was held in high esteem by all with whom he came in contact.

HENRY A. MARTIN, M.D. BOSTON, MASS.

THIS well-known surgeon died on Dec. 7th, 1884, aged sixty years. He graduated at the Harvard Medical School in 1845, and commenced practice shortly afterwards. On the breaking out of the war in 1862 he was appointed staff surgeon, and served in that capacity at Fort Monroe. Subsequently he became medical director of the department of South-Eastern Missouri, of Norfolk, Portsmouth, and Newbern; and then, in the Army of the Potomac, surgeon-in-chief of the first division of the Second Army Corps. On his resignation he received the brevet rank of Lieutenant-Colonel for "gallant and meritorious services." In 1870 Dr. Martin introduced the Beaugency virus into America; and in 1877 he brought before the notice of the profession the pure rubber bandage, the use of which he proposed in the treatment of ulcers of the leg.

Medical News.

ROYAL COLLEGE OF PHYSICIANS OF LONDON.—The following gentlemen were admitted Members of the College on the 29th ult.:—

Dakin, William Radford, M.D. Lond., Edith-road.
Foxwell, William A., M.B. Camb., General Hospital, Birmingham.
Handford, Henry, M.D. Edin., Nottingham.
Lewers, Arthur Hamilton Nicholson, M.B. Lond., Gower-street.
McDonagh, John Michael, M.D. Brussels, Beaufort-street.
Pasteur, William, M.D. Lond., Queen-street, Mayfair.

On the same day the following candidates were admitted Licentiates:—

Adams, Gofton Gee, Oakfield-park, Clifton, Bristol.
Annacker, Ernest, Oxford-street, Manchester.
Bower, Edward Ignatius, Acton-street.
Bowie, Robert Forbes, Huntley-street.
Bury, Herbert Taylor, Granby-street.
Canfield, Ralph Metcalf, M.D. Vermont, Amwell-street.
Cox, Robert Hippisley, Mount-street.
De'Ath, George Hanby, Guy's Hospital.
De Montbrun, Domingo Antonio, Osnaburgh-street.
Dingley, Arthur William, Camden-road.
Downes, Howard, St. Mary's-road, Canonbury.
Fetherstonhaugh, Robert Trevor, Park-road, West Dulwich.
Fisher, Henry Holdrich, Wilmington-square.
Gilbertson, James Henry, Hertford.
Gordon, Frederick William, Brynarials, Llandidrod Wells.
Gubb, Alfred Samuel, French Hospital, Leicester-square.
Hacking, John Herbert, Old Trafford, Manchester.
Hall, William Hamilton, Claremont-square.
Henry, William George, M.D. McGill, Torrington-square.
Huntington, William, Amberley-street, Liverpool.
Jones, John Arnallt, Tir Caradoc, Talfach.
Joeling, Charles Langford, Sidcup.
Kebbell, Charles, Sussex County Hospital, Brighton.
Lake, Richard, Bexborough-gardens.
Laurie, Caspar Robert, Buckhurst-hill.
McKillop, Alexander, M.D. Toronto, Nicholas-street.
Medley, Harold, Thomas Dupuis, Brondesbury Villas.
Messiter, Arthur Frederick, Willington, Burton-on Trent.
Mullis, George William, Penton-place.
Page, Alfred Matthew, St. John's-wood-terrace.
Parfitt, Edward Browne, Maxilla-gardens.
Pulling, Herbert John, Denbigh-street.
Ross, William Albert, Toronto, Canada.
Rugg, George Lewis, Stockwell Villa, Clapham-road.

Shackel, George Arthur, Erleigh Court, Reading.
Smith, Albert, Stockwell-green.
Spry, William, Upper Bedford-place.
Staddon, John Richard, Pentiman-road.
Stewart, George Eland, Coburg-road.
Strickland, Charles, Warwick-road.
Thorold, William Grant, Sussex-street, Pimlico.
Tratman, Frank, St. Peter's-road.
Turner, Frederick Senior, Avenue, Chiswick.
Washbourn, William, Granby-street.
West, Charles James, Buckingham Palace-road.
Williams, Reginald Muzio, Blackheath-hill.
Williams, Robert Richard, Ampton-place.
Winckler, William, University Hospital.

The following gentlemen passed the Primary Examination for the Licence on the 2nd inst.:—

A. J. Adie, H. Armstrong, R. D. Barber, W. O. Barsham, H. C. Bartlett, W. Bett, E. G. Blaxland, B. M. Bond, H. B. Brackenbury, C. Christopherson, S. A. Clarke, R. G. Cookson, E. E. Dalton, E. P. Daniell, H. M. L. Dean, H. Debenham, R. B. Eccles, C. H. Evans, F. R. Farmer, M. J. Finucane, N. H. Forbes, F. T. Frost, W. R. Garrould, W. Green, H. E. Hackett, W. Harries, H. J. Hawthorn, E. J. Haynes, C. P. K. Hemming, W. H. Henshaw, C. T. Hudson, F. H. Hudson, J. Hutchinson, T. B. Jacobson, A. G. James, J. A. James, T. John, R. F. Jowers, C. N. Lovely, W. R. N. Maloney, F. G. S. G. Martin, F. R. Miller, E. Morris, W. H. Moyle, S. A. Mugford, G. W. Ord, A. E. Palmer, H. C. Parsons, A. E. Paul, G. Perrin, J. D. Price, W. T. Rayne, R. F. Reading, W. Roalfe-Cox, A. Roberts, P. Rose, H. W. Scratchley, P. I. Shopoff, H. Sieveking, C. S. Simpson, E. S. Smith, H. S. Smith, F. A. Warner, W. D. Wells, H. J. Wheeler, O. A. Wickham, S. Wigglesworth, V. Wigglesworth, C. Wisken, A. B. Woakes, R. W. Wright, T. N. Wright, J. H. Yolland, R. W. Young.

ROYAL COLLEGE OF SURGEONS OF ENGLAND.—The following gentlemen, having passed the required examination for the diploma, were admitted Members of the College at a meeting of the Court of Examiners on the 29th ult.:—

Dingley, Arthur William, L.R.C.P. Lond., Camden-road.
Messiter, Arthur Frederick, L.R.C.P. Lond., Burton-on-Trent.
Thorold, William Grant, L.R.C.P. Lond., Ilfracombe.
Lake, Richard, L.R.C.P. Lond., Bessborough-gardens.
Freeland, Freeland John, L.S.A., Torrington-square.
Wilding, James, L.S.A., Lambourne-road.
Maggs, William Adolphus, L.S.A., Hanover-square.
Thomas, Thomas William, L.S.A., Albert-street.
Shadwell, Harry Winstanley, L.S.A., Hammersmith.
McCabe, William Alexander Bowes, L.S.A., St. Heliers.
Williams, Edward Lloyd, L.R.C.P. Lond., Buckingham-gate.

Admitted on the 30th ult.:—

Bennett, James Robert Abrahall, L.S.A., Lydford, Devon.
Hall, William Hamilton, L.R.C.P. Lond. Lancing.
Guinness, Harry Gratton, L.S.A., Bow.
Staddon, John Richard, L.R.C.P. Lond., Ipswich.
Llewellyn, John, L.S.A., Mount-place.
Barron, Hunter Jackson, L.R.C.P. Lond., Endsleigh-street.
Edwards, Richard, Pontalgoal.
Oakley, William Donald, M.D. McGill, Ontario.
Mason, Francis John Goringe, Woolwich.
Nowell, Barnes, West Kensington.
Southern, Francis Gerald, L.S.A., Ludlow, Salop.
Coleman, William Edward, Albert-street.
Harris, Arthur Wellesley, L.S.A., Exmouth-street.
Kelson, William Henry, L.S.A., St. Peter's-street.
Soutter, James, L.S.A., Hull.
Hartzhorne, Bernard Frederic, L.S.A., Chiswick.
Davidson, Charles Robert, M.B. Durh., Lincoln.
Cropley, Alfred, L.S.A., Swaton, Lincolnshire.

Admitted on the 2nd inst.:—

Smith, Edward John, L.S.A., Brixton.
Rockwood, William Gabriel, M.D. Madrat, Ceylon.
Bencraft, Henry William Russell, Southampton.
Wright, Frank Marsh, L.S.A., Bottesford, Notts.
Stevenson, William Dymes, L.S.A., Kew Gardens.
Bateman, Frederick Augustus Newton, L.R.C.P. Lond., Pall-mall.
Jones, Herbert Charles Walter, L.S.A., Cheltenham.
Ritson, Robert, Maryport, Cumberland.

Admitted on the 3rd inst.:—

Barnett, Frank Septimus, L.S.A., Stoke Newington.
Huzzey, Reginald Lee, L.S.A., Ampthill, Beds.
Brooks, Samuel John, L.S.A., Tollington-park.
Sequeira, Henry James, L.S.A., Jewry-street.
Harcourt, Vincent Xymines, L.R.C.P. Lond., Eastbourne.
Nicholson, Henry Gilbert, L.S.A., Hereford.
Doudney, George Herbert, M.D. Durh., West Dulwich.
Munro, William John, M.B. Edin., Sydney, New South Wales.
Mathews, Frank Edward, L.S.A., Doughty-street.
Thompson, Walter Scott, George-street.

Admitted on the 4th inst.:—

Annacker, Ernest, L.R.C.P. Lond., Manchester.
Dixey, Frederick Augustus, M.B. Oxon., Oxford.
Jackson, Herbert Francis, Ballina.
Laurie, Caspar Robert, L.S.A., Bournemouth.
Wingrave, Vitruvius Harold Wyatt, L.S.A., Guildford-street.

Admitted on the 28th ult.:—

Sillick, James Henderson, Merrick-square.

Of 234 candidates who presented themselves for examination, 89 passed and obtained their diplomas; 45 passed in Surgery only and will receive their diplomas on passing in Medicine and Midwifery, or on obtaining a medical qualification; 17 were referred for 3 months, 76 for 6 months, 4 for 9 months, and 3 for one year.

COLLEGE OF PHYSICIANS IN IRELAND.—At the January examinations the following obtained the licences in Medicine and Midwifery of the College:—

MEDICINE.—W. Beatty, Francis Lindesay Carte, John Joseph Costello, John Alfred Laycock, James Griffiths Whittendale.
MIDWIFERY.—Louis Albert Frederick Bate, Francis Forster Brady, John J. Costello, Samuel Ebenezer Falconer, John Samuel Fenton, John Alfred Laycock, Alfred John Smith.

The undermentioned was admitted a Member:—
Robert Fitzmaurice.

APOTHECARIES' HALL.—The following gentlemen passed their examination in the Science and Practice of Medicine, and received certificates to practise, on the 29th ult.:—

Barnard, Walter Burrows, Charing-cross Hospital.
Bennett, Deane, St. Mary's Hospital.
Bennett, James Robert Abrahall, University College.
Blomfield, George Wills, London Hospital.
Ensor, Edwin Thomas, London Hospital.
Guinness, Harry Grattan, London Hospital.
Haynes, Charles, Charing-cross Hospital.
Jones, Edward Francis, London Hospital.
Long, Frederick William Devereux, Charing-cross Hospital.
Noyes, Alexander, Wellesley Finch, Charing-cross Hospital.
Stephens, William John, King's College.
Weston, Joseph Theophilus, Bengal Medical College, Calcutta.

[After the name of Mr. Ernest Roach, in last week's list read, "Guy's and Queen's Hospitals, Birmingham."]

THE Queen has been pleased to announce to the father of the late Dr. Marshall, Her Majesty's Resident Physician, that she has granted him a yearly pension of £150 for life. Mr. Marshall resides at Crieff, Perthshire.

THE plans for a Paddington-green Park which Mr. Mark H. Judge submitted to the Paddington Vestry in 1883, are now being considered by the Metropolitan Public Garden, Boulevard, &c., Association.

MEDICAL MAGISTRATE.—Alex. W. Macfarlane, M.D., F.R.C.P. Edin., has been placed on the Commission of the Peace for the county of Ayr, on the recommendation of the Lord Lieutenant.

ON the recommendation of Mr. Gladstone, a grant of £100 from the Royal Bounty Fund has been made to Dr. George Gore, F.R.S., in recognition of his eminent services in original chemical research.

DEATH UNDER CHLOROFORM.—An inquest was held in Salford on the 29th ult. on the body of a boy who died in the Salford Hospital while under the influence of chloroform, given previous to the removal of a piece of necrosed bone from the leg. The jury returned a verdict of "Death by misadventure."

THE WELSH LIBEL CASE.—The action brought by Dr. Howell of St. Clears, medical officer to the Carmarthen Board of Guardians, claiming £10,000 from the Board for alleged wrongful dismissal and libel, has been dismissed with costs by the District Registrar of the High Court of Justice.

THE VENTNOR HOSPITAL.—The Royal National Hospital for Consumption and Diseases of the Chest, Ventnor, has just received the grant of a Royal Charter of Incorporation. The petition to the Queen was signed by the Duke of Albany, the then president, a short time before his decease. Lord Rosebery has since consented to act as his successor.

THE EPIDEMIC AT KIDDERMINSTER.—The official report of Dr. Parsons to the Local Government Board upon the enteric fever epidemic at Kidderminster was laid before the Town Council on the 4th inst. The sewers and house drains throughout the town are stated in the report to be seriously defective, and the question of contamination of the water-supply is discussed at some length. Dr. Parsons conclusion is that the cause of the epidemic cannot be be certainly assigned. He points out clearly the steps which ought to be taken as to improved water-supply, amendments in the sewerage, and other matters. The report of the engineer estimates the probable cost of the works required at £250,000.

SOCIETY FOR RELIEF OF WIDOWS AND ORPHANS OF MEDICAL MEN.—The usual quarterly court of directors of the Society was held on Wednesday, January 14th, the President, Sir James Paget, in the chair. A sum of £1361 was voted to be distributed among the sixty-three widows

and eleven orphans in receipt of ordinary grants, and the three orphans receiving extraordinary relief from the Copeland Fund. The expenses of the quarter amounted to £61 8s. The acting treasurer announced a legacy of £100, duty free, from Dr. Nathaniel Rogers of Exmouth. Two new members were elected, the deaths of four reported, and the resignation of another accepted. Fresh applications for grants were received from three widows, for themselves and four children, and, on the report of the committee of visitors, assistance was given to all.

THE GERMAN HOSPITAL.—The report which was read at the recent annual general meeting of the subscribers to this institution stated that the number of in-patients during 1884 was 1822, of whom 353 were cases of accidents, most of them English; 45 were admitted into the sanitorium; 351 gained admission into the Convalescent Home at Dalston, and as many as 34 were sent to the Convalescent Hospital at Eastbourne. The number of out-patients last year was as follows:—At the Hospital Dispensary (including 2001 cases of accidents treated as out-patients, three-fourths of them being English), 15,921; at the Eastern Dispensary of the institution, 3994; at the Western, 1760; dental cases, 1003; making a total (together with 1822 in-patients) of 24,500.

DEATH OF MR. GEORGE J. FORD.—It is with regret that we record the death, on the 3rd instant, at the Royal College of Surgeons of England, of Mr. George Jaques Ford, at the age of sixty-five, from Bright's disease. Born on Dec. 11th, 1819, at Balsham, Cambridgeshire, he entered the service of the College as hall porter in 1840, where during upwards of forty-four years he secured the esteem, trust, and indeed friendship of all the officers and servants. During his illness he was attended by Dr. Frederick J. Goodhart with unceasing care and kindness. The older Fellows and Members of the College will miss a well-known face on entering the College, and one which served as a connecting link between the past and the present. By his death the College loses an old and trustworthy servant. The funeral will take place at Kensal-green Cemetery to-day (Saturday), at 2.30 o'clock.

HUNTERIAN SOCIETY.—The annual meeting of this Society will be held on Wednesday, Feb. 11th, at 7.30 P.M.; after which, at 8 P.M., the oration will be delivered in the theatre of the London Institution by Dr. F. Charlewood Turner. The annual dinner will be held at the "Albion," Aldersgate-street, on Friday, Feb. 13th, at 6.30 P.M., Dr. Robert Fowler, President, in the chair. The following is the list of officers for the ensuing year:—President: Dr. Pye Smith. Vice-Presidents: Dr. Major Greenwood, Mr. W. C. Toulmin, Mr. William Clapton, Dr. Stephen Mackenzie. Treasurer: Dr. Fotherby. Trustees: Dr. Fotherby and Mr. De Berdt Hovell. Librarian: P. L. Burchell, M.B. Orator: Sir Andrew Clark. Secretaries: Mr. Charters Symonds and Dr. Charlewood Turner. Council: Drs. Carrington, Robert Fowler, E. G. Gilbert, J. Dundas Grant, W. Talbot King, John Millar; Messrs. G. Ernest Herman, F. M. Corner, Charles Davidson, T. R. Fendick, W. Rivington, R. G. Tatham.

Medical Appointments.

Intimations for this column must be sent DIRECT *to the Office of* THE LANCET *before 9 o'clock on Thursday Morning at the latest.*

BERRINGER, Mr. J. J., has been appointed Public Analyst for the Borough of Penryn.

BROWNE, GEO. HENRY, L.F.P.S.Glas., L.R.C.P.Ed., L.A.H.Dub., has been appointed Public Vaccinator for the Llanelly District of the Crickhowell Union.

CARRINGTON, R. EDMUND, M.D.Lond., M.R.C.P.L., has been appointed an Assistant-Physician to Guy's Hospital.

CASSAL, Mr. C. E., has been appointed Public Analyst for the Parish of Kensington.

CLUBBE, C. P. BARLEE, L.R.C.P.Lond., M.R.C.S., has been appointed Honorary Surgeon to the Children's Hospital, Glebe, New South Wales.

CRESSWELL, THOMAS HOBBES, M.R.C.S., L.S.A.Lond., has been appointed Medical Officer for the Arncliffe District of the Settle Union.

EAKINS, GEORGE REGINALD, M.D.Brux., L.R.C.P.Ed., L.R.C.S.Ed., has been appointed Honorary Consulting Physician to the Echuca Hospital, Victoria.

ENSOR, HENRY C., M.R.C.S. & L.S.A.Lond., has been appointed House-Surgeon to the Birmingham and Midland Eye Hospital.

GROOM, HENRY THOMAS, M.R.C.S., L.S.A.Lond., has been appointed Assistant Medical Officer to the Walton Workhouse, West Derby Union.

HARLAND, Mr. R. H., has been appointed Public Analyst for Greenwich.

HICKS, BRAXTON, M.D.Lond., F.R.C.P., F.R.S., has been elected an Honorary Physician to the Royal Maternity Charity.

JOHNSON, CHARLES HENRY, M.R.C.S., L.S.A.Lond., has been appointed Medical Officer for the Fourth District of the Basingstoke Union.

JOHNSTON, M., M.R.C.S., L.R.C.P., L.M.Lond., has been appointed Junior Assistant Medical Officer to the Sussex County Lunatic Asylum, Hayward's-heath.

KING, ARTHUR, L.D.S., has been appointed Dental House-Surgeon to the Dental Hospital of London.

LYON, THOMAS GLOVER, M.A.Camb., L.R.C.P.Lond., M.R.C.S., has been appointed Clinical Assistant to the Hospital for Diseases of the Skin, Blackfriars.

MANSELL-MOULLIN, JAMES ALFRED, M.A., M.B.Oxon., M.R.C.P., M.R.C.S., L.S.A.Lond., & L.M., has been appointed Assistant-Physician for Diseases of Women at the West London Hospital, vice Albert Venn, promoted.

PARKES, LOUIS, M.D., S.Sc.C.Lond. Univ., has been appointed Medical Officer to the Mansion House Council on the Dwellings of the Poor, vice B. A. Whitelegge, M.D., B.Sc., resigned.

POWELL, JOHN JOS., M.B.Lond., M.R.C.S., has been appointed House-Physician to the Queen's Hospital, Birmingham.

PRIEST, JAMES DAMER, M.R.C.S., L.S.A.Lond., has been appointed Medical Officer for the Waltham District of the Edmonton Union.

SAUNDBY, R., M.D., C.M.Ed., M.R.C.P.Lond., has been elected Physician to the Birmingham General Hospital, vice Dr. Russell, resigned.

SAUNDERS, W. SEDGWICK, M.D., L.R.C.P.Ed., M.R.C.S., has been reappointed Medical Officer of Health and Public Analyst for the City of London.

SMITH, Mr. C. R., has been appointed Deputy Assistant Dental House-Surgeon to the Dental Hospital of London.

STEELE, RICHARD, L.R.C.P.Ed., M.R.C.S., has been appointed Medical Officer to the Cottage Homes, Leicester Union.

VENN, ALBERT, M.D.Aberd., M.B. & C.M., M.R.C.P.Lond., has been appointed Physician for Diseases of Women at the West London Hospital, vice Alfred Wiltshire, F.R.C.P.Lond., M.D. St. And., resigned.

VIPOND-CROCKER, J. C., L.D.S., has been appointed Assistant Dental House-Surgeon to the Dental Hospital of London.

WALKER, E. B. C., M.B., M.C.Ed. (late Junior Assistant Medical Officer), has been appointed Senior Assistant Medical Officer to the Sussex County Lunatic Asylum, Hayward's-heath.

WILLIAMSON, HARRY MAJOR LECKENLY, L.R.C.P.Ed., L.R.C.S.Ed., has been appointed Medical Officer for the Clapham District of the Little Union.

Births, Marriages, and Deaths.

BIRTHS.

GIFFARD.—On the 27th ult., at Pavilion-parade, Old Steine, Brighton, the wife of Douglas W. Giffard, M.R.C.S., of a son.

LARKIN.—On the 24th ult., at Grove-park, Kent, S.E., the wife of F. G. Larkin, L.R.C.P., M.R.C.S., of a son.

O'BRIEN.—On the 20th ult., at Peshawur, Punjab, India, the wife of Surgeon-Major T. B. P. O'Brien, Army Medical Department, of a son.

PARSONS.—On the 28th ult., at Whitworth-road, South Norwood, the wife of H. Franklin Parsons, M.D., of a daughter.

ROOME.—On the 1st inst., at Fuelen House, Guildford, the wife of Henry A. Roome, M.B., of a son.

MARRIAGES.

BENJAFIELD—WILKINSON.—On the 29th ult., at New College Chapel, London, William B. Benjafield, M.B.Ed., of Edmonton, to Miriam Alice, daughter of Joseph Wilkinson, of Foley-avenue, Well-walk, Hampstead-heath.

LUKIS—STEWART.—On the 20th ult., at Cawnpore, India, Charles Pardey Lukis, Surgeon Bengal Medical Service, to Lilian, daughter of John Stewart, Esq., of Ardvorlich, Perthshire, Colonel Royal Artillery, Cawnpore.

PORTER—CHAMBERS.—On the 29th ult., at St. George's, Hanover-square, J. Francis Porter, M.D., to Edith S., only child of G. Chambers, Esq.

SPARROW—PILLING.—On the 29th ult., at St. Luke's Church, Southport, Robert Lancelot Sparrow, M.R.C.S., to Louisa, younger daughter of the late James Pilling, Stone Hill, Rochdale.

DEATHS.

BRAITHWAITE.—On the 31st ult., at Clarendon-road, Leeds, William Braithwaite, M.D., in his 78th year.

BRUCE-JOY.—On the 28th ult., at Pembridge-gardens, Bayswater, William Bruce-Joy, M.D., formerly of Leeson-street, Dublin, in his 63th year.

CAMERON.—On Dec. 30th, 1884, at his residence, Main-street, Georgetown, Demerara, British Guiana, Alexander Gordon Matheson Cameron, M.D., youngest son of the late Capt. John Cameron, 79th (Cameron) Highlanders, aged 58.

MARTIN.—On the 19th ult., at Oundle, J. C. Martin, M.R.C.S., aged 63.

MCNAY.—On the 29th ult., at Scarcliburg, Bournemouth, Annie Elizabeth, eldest surviving daughter of the late Thomas F. McNay, M.D., F.R.C.S., of Newcastle-upon-Tyne. No cards.

MIDDLEDITCH.—On the 29th ult., at his residence, Ladbroke-grove-road, W., Henry Arthur Middleditch, M.D., M.R.C.S., L.S.A.Lond., aged 62.

PARROTT.—On the 31st ult., at his residence, Clapham-common, S.W., John Parrott, M.R.C.S., in his 65th year.

WILLIAMS.—On the 16th ult., at Zanzibar, of malarial fever, John Alexander Williams, M.B., M.R.C.S., Medical Officer to Her Majesty's Consulate, aged 29. By telegram.

WORTHINGTON.—On the 31st ult., at Lowestoft, William Collins Worthington, F.R.C.S., in his 83th year.

N.B.—A fee of 5s. is charged for the Insertion of Notices of Births, Marriages, and Deaths

Medical Diary for the ensuing Week.

Monday, February 9.

ROYAL LONDON OPHTHALMIC HOSPITAL, MOORFIELDS.—Operations, 10.30 A.M. each day, and at the same hour.

ROYAL WESTMINSTER OPHTHALMIC HOSPITAL.—Operations, 1.30 P.M. each day, and at the same hour.

ST. MARK'S HOSPITAL.—Operations, 2 P.M., and on Tuesdays at the same hour.

HOSPITAL FOR WOMEN, SOHO-SQUARE.—Operations, 2 P.M., and on Thursday at the same hour.

METROPOLITAN FREE HOSPITAL.—Operations, 2 P.M.

ROYAL ORTHOPÆDIC HOSPITAL.—Operations, 2 P.M.

MEDICAL SOCIETY OF LONDON.—8 P.M. Mr. Henry Morris will open a Discussion on some points in the Surgery of the Kidney.—Mr. James Startin will show Cases of Lupus cured by Caustics.

Tuesday, February 10.

GUY'S HOSPITAL.—Operations, 1.30 P.M., and on Friday at the same hour. Ophthalmic Operations on Mondays at 1.30 P.M., and Thursdays at 2 P.M.

ST. THOMAS'S HOSPITAL.—Ophthalmic Operations, 4 P.M., and on Fridays at 2 P.M.

WESTMINSTER HOSPITAL.—Operations, 2 P.M.

WEST LONDON HOSPITAL.—Operations, 2.30 P.M.

CANCER HOSPITAL, BROMPTON.—Operations, 2.30 P.M., and on Saturday at the same hour.

ROYAL INSTITUTION.—3 P.M. Prof. Moseley: Colonial Animals.

ANTHROPOLOGICAL INSTITUTE OF GREAT BRITAIN AND IRELAND.—8 P.M. Mr. H. H. Johnston: The People of East Equatorial Africa.

ROYAL MEDICAL AND CHIRURGICAL SOCIETY.—8.30 P.M. Dr. D. Lowson: Case of Displacement and Fracture of the Axis.—Mr. Richard Davy: The Radical Cure of Club-foot, with exhibition of Cases.

Wednesday, February 11.

NATIONAL ORTHOPÆDIC HOSPITAL.—Operations, 10 A.M.

MIDDLESEX HOSPITAL.—Operations, 1 P.M.

ST. BARTHOLOMEW'S HOSPITAL.—Operations, 1.30 P.M., and on Saturday at the same hour.—Ophthalmic Operations on Tuesdays and Thursdays at 1.30 P.M.

ST. MARY'S HOSPITAL.—Operations, 1.30 P.M. Skin Department: 9.30 A.M., on Tuesdays and Fridays.

ST. THOMAS'S HOSPITAL.—Operations, 1.30 P.M., and on Saturday at the same hour.

LONDON HOSPITAL.—Operations, 2 P.M., and on Thursday and Saturday at the same hour.

GREAT NORTHERN CENTRAL HOSPITAL.—Operations, 2 P.M.

SAMARITAN FREE HOSPITAL FOR WOMEN AND CHILDREN.—Operations, 2.30 P.M.

UNIVERSITY COLLEGE HOSPITAL.—Operations, 2 P.M., and on Saturday at the same hour. Skin Department: 1.45 P.M., and on Saturday at 9.15 A.M.

ROYAL FREE HOSPITAL.—Operations, 2 P.M.

HUNTERIAN SOCIETY.—7.30 P.M. Annual Meeting.—8 P.M. Oration by Dr. F. Charlewood Turner.

EPIDEMIOLOGICAL SOCIETY OF LONDON.—8 P.M. Major K. McLeod: The Prevalence of Epidemic Roseola in Calcutta.

ROYAL MICROSCOPICAL SOCIETY.—8 P.M. Presidential Address, illustrated by Lantern Microscope: On the Life History of a Septic Organism hitherto unrecorded.

Thursday, February 12.

ST. GEORGE'S HOSPITAL.—Operations, 1 P.M.

ST. BARTHOLOMEW'S HOSPITAL.—Surgical Consultations, 1.30 P.M.

CHARING-CROSS HOSPITAL.—Operations, 2 P.M.

CENTRAL LONDON OPHTHALMIC HOSPITAL.—Operations, 2 P.M., and on Friday at the same hour.

NORTH-WEST LONDON HOSPITAL.—Operations, 2.30 P.M.

ROYAL INSTITUTION.—3 P.M. Prof. Dewar: The New Chemistry.

THE PARKES MUSEUM OF HYGIENE.—8 P.M. Dr. Percy Frankland: The Selection of Water for Domestic Supply.

Friday, February 13.

ST. GEORGE'S HOSPITAL.—Ophthalmic Operations, 1.30 P.M.

ROYAL SOUTH LONDON OPHTHALMIC HOSPITAL.—Operations, 2 P.M.

KING'S COLLEGE HOSPITAL.—Operations, 2 P.M.

MEDICO-PSYCHOLOGICAL ASSOCIATION.—4 P.M. Dr. Hayes Newington: The Influence of Minor Uterine Troubles on Insanity.—Dr. Hack Tuke: The Insane in the United States.

CLINICAL SOCIETY OF LONDON.—8.30 P.M. President's Address.—Dr. Hale White: A Case of Myxœdema, with a Post-mortem Examination.—Dr. Carrington and Dr. Hale White: Two Cases of Phlegmonous Pharyngitis.—Dr. Hughes Bennett: A Case of Locomotor Ataxy without Disease of the Posterior Columns of the Cord.—Dr. Seymour Taylor: A Case of arrested Rickets (living specimen).

ROYAL INSTITUTION.—9 P.M. Sir John Lubbock: Forms of Leaves.

Saturday, February 14.

KING'S COLLEGE HOSPITAL.—Operations, 1 P.M.

ROYAL FREE HOSPITAL.—Operations, 2 P.M.

ROYAL COLLEGE OF SURGEONS OF ENGLAND.—3 P.M. Prof. John Marshall will deliver the Hunterian Oration.

ROYAL INSTITUTION.—3 P.M. Mr. G. Johnstone Stoney: Operations which go on between Molecules.

METEOROLOGICAL READINGS.

(Taken daily at 8.30 a.m. by Steward's Instruments.)

THE LANCET OFFICE, February 5th, 1885.

Date.	Barometer reduced to Sea Level and 32° F.	Direction of Wind.	Dry Bulb.	Wet Bulb.	Solar Radia in Vacuo.	Max. Temp. Shade.	Min. Temp	Rain fall.	Remarks at 8.30 A.M.
Jan. 30	29.32	S.W.	48	47	...	53	47	·12	Raining
,, 31	29·11	S.	45	43	...	48	42	·07	Cloudy
Feb. 1	29·14	S.W.	45	43	...	51	41	...	Cloudy
,, 2	29·31	S.W.	50	47	...	55	42	...	Cloudy
,, 3	29·22	W.	46	44	...	51	43	·06	Cloudy
,, 4	29·40	S.W.	42	41	...	48	39	...	Cloudy
,, 5	29·35	S.W.	40	38	...	46	33	·25	Cloudy

Notes, Short Comments, & Answers to Correspondents.

It is especially requested that early intelligence of local events having a medical interest, or which it is desirable to bring under the notice of the profession, may be sent direct to this Office.

All communications relating to the editorial business of the journal must be addressed "To the Editor."

Lectures, original articles, and reports should be written on one side only of the paper.

Letters, whether intended for publication or private information, must be authenticated by the names and addresses of their writers, not necessarily for publication.

We cannot prescribe, or recommend practitioners.

Local papers containing reports or news-paragraphs should be marked.

Letters relating to the publication, sale, and advertising departments of THE LANCET *to be addressed "To the Publisher."*

EAU DE TABLE.

IT has often been a matter of surprise that an agent of such prime importance in vital processes as oxygen undoubtedly is should so long have remained in a comparatively obscure position as a remedial agent. But the fact is, that in its ordinary form oxygen gas does not seem capable of direct employment with any special advantages. The attempt now made by Messrs. Brin Frères of Paris-Passy to introduce into use a distilled water saturated with oxygen must be regarded in a very favourable light. The profession in France seem to have taken eagerly to this new preparation, and it is being largely employed in hospitals for the purposes of inhalation in various diseases. In the preparation of the "eau de table" filtered water is stated to be used and then saturated with pure oxygen. In a cylinder capable of supporting a pressure of 300 lb. to the square inch a certain quantity of oxygen is dissolved in the water, while the excess of gas which has not been taken up remains imprisoned in the water, which is then put into bottles and syphons. The water is used for ordinary drinking purposes, and, mixed with wine or other liquors, is said to develop their aroma. It appears to have been useful in many diseases of the digestive and urinary organs.

Dr. Robert Bell.—We shall be happy to give attention to the matter on receipt of the sample.

Mr. Joseph Abbott.—We are unable to comply with the request.

"PRURITUS VULVÆ."

To the Editor of THE LANCET.

SIR,—In compliance with the request of "M.D." for suggestions in the treatment of pruritus vulvæ, I would refer him to the history of a case recorded by me in THE LANCET of Dec. 6th, 1884, under the heading of "The Spinal Cord in Health and Disease" (Case 14), and would advise that he treat his patient in a similar manner, and to kindly inform me of the result either privately or through THE LANCET. Your correspondent does not state whether his patient's ailment is complicated with pregnancy; but I should regard its concomitance or otherwise immaterial to the issue, as, if my theory of the causation of the disease be correct, and that it is due to central and reflex agency, no merely local medication can effect a cure. My plan is simply vesication over the spine at the region of the fourth and fifth dorsal vertebræ, which limited zone I have demonstrated stands in pathological relation with disease in many distant organs.—Yours truly,

Belfast, Feb. 3rd, 1885. ALEXANDER HARKIN, M.D., L.R.C.S.

M.D. (S.E.) would do well not to use the ordinary form of death certificate. He cannot legally certify.

Mr. George Abbott (Tunbridge Wells).—Next week.

Mr. Spreull (Dundee).—The letter has not been preserved.

OVARIOTOMY IN CHINA.

THE ovariotomy recently performed at Shanghai by an American lady doctor has been made the subject of an illustration in a pictorial magazine published for the instruction and amusement of natives by a Chinese printing establishment in Shanghai. The drawing is curious in many respects, none of its details being correct, and is accompanied by an explanation in which Chinese doctors are branded as humbugs who shelter themselves behind the inevitable course of nature when a patient dies, and bombastically take credit for great skill when nature in spite of them brings about a cure.

Messrs. Ferguson and Co.—Galton's whistles can be obtained, properly graduated, of Mr. J. P. Hawksley, acoustical instrument maker, 357, Oxford-street, W.

Practitioner.—It is impossible to lay down an inflexible rule. It is better to follow the custom which has prevailed in the place.

MEDICAL PRACTICE IN THE ARGENTINE REPUBLIC.

To the Editor of THE LANCET.

SIR,—In your issue of Jan. 24th there is a paragraph referring to the Argentine Republic as an El Dorado. If this is so, things must have changed since I was there in 1865, though, according to the letter quoted from the *South American Journal*, matters seem much the same. I would strongly urge would-be participators to make further inquiries. It is quite true that there is a Government Medical Board, of which every (passed) medical man resident in Buenos Ayres is a member, to whom is entrusted the examination, in Spanish, of all foreigners desiring to practise in the Republic. It did not follow, however, that passing or failure at the examination was any criterion of the knowledge of the candidate. It was an open secret at the time I am writing of that unless the candidate had entered into partnership with one of the resident medical men, therefore an *ex-officio* member of the Examining Board, either paying a considerable sum for the position, or in some way giving an equivalent, his chance of passing was very limited. I may perhaps be allowed to illustrate the fact by my own case. I was offered £500 per annum to become an assistant to an Englishman having English qualifications and qualified according to the laws of the Republic, with the further advantage of a partnership after five years, on condition that I passed the Medical Board. This seemed so good that I was on the point of accepting the offer, when a friend, an old resident in Buenos Ayres, informed me that the medical man in question had already tempted others in a similar way; but, on presenting themselves for examination, the result was uniform—they were plucked. It was openly suggested that an arrangement had been come to between members of the Board by which some member other than his principal plucked the candidate, and expected a similar return from his brother members when occasion required. Without passing this examination you have no *locus standi*, cannot recover fees, and, moreover, are liable to prosecution in any unsuccessful case.

I very much doubt if such sums as are mentioned have ever been paid, save in some exceptional case, though no doubt fees are higher than with us. Expenses, too are very heavy, greater even than in England, and very few of the most successful practitioners seem to be able to leave their families free from all anxiety in pecuniary matters at their decease. I am sorry to throw cold water on anything that gives a hope that the profession may find a "trump" at last; but perhaps a word of warning may lead enthusiastic beginners to realise that there are two sides to the story. Persons and things may have changed during the past twenty years; but such a close borough is not likely to have yielded to reform without a hard fight, and anyone who knows South American Republics will not be surprised if something akin to what I have described has survived to the present day.

I may add, the dollar when not specie represents 2½*d.* in this Republic. While I was there the Government fixed the value of the English sovereign by authority—viz., 122½ dollars paper.

I am, Sir, yours faithfully,

Jan. 31st, 1885. J. R. L.

Dr. J. Lawrence.—Messrs. Richards, Glanville and Co., 4, Brown's-buildings, St. Mary Axe, E.C.

Dr. Cafferata (Louvain).—There is no smaller English work than Green's Manual of Pathology, or Woodhead's Practical Pathology.

Dr. Freyer's paper will appear in an early number.

LOCK HOSPITALS IN INDIA.

To the Editor of THE LANCET.

SIR,—It is stated, apparently on good authority, in *Allen's Indian Mail* of Jan. 20th, that, as an experimental measure, it has been decided to close the lock hospitals at a number of stations in the Bengal Presidency, and, among the rest, those at Allahabad and Cawnpore. I am aware that for some time past this view has been impressed on the Government by one of the leading sanitary authorities in India, and at last apparently with success. Allow me to say that, having had many years' experience of the working of lock hospitals in India, especially at Cawnpore, I believe the step now taken to be not only a retrograde one, but also one fraught with danger to the soldier and loss to the State. If this step be carried out we may expect a large increase of sickness from the most preventable form of disease, and when too late the folly of the step will be apparent.—I am, Sir, your obedient servant,

J. B. HAMILTON, M.D.,
Dublin, Jan. 28th, 1885. Surgeon-Major, Medical Staff.

TESTS FOR HEARING.

PROFESSOR A. GRAHAM BELL has recently added to the instruments for measuring the acumen of the senses by the construction of an apparatus for determining the capacity of the ear. It has been described as a telephone receiver with a rotary circuit breaker revolving at a sufficiently high speed to produce a note of uniform pitch to the listener at the telephone. By means of increasing the distance between two coils in the circuit the current is diminished, and the sound at the telephone weakened until inaudible. By means of a scale showing the distance between the coils a standard is obtained for the representation of the acuteness of the hearing. It has been found that equal capacity of both ears is exceptional, most persons having a marked difference in this respect. From the results of a number of tests among the public school children in New York, Professor Bell estimates that 10 per cent. have slight defects in hearing, and that 1 per cent. are too deaf to receive benefit from the ordinary modes of instruction.

Mr. E. J. Gurdon.—The London office of the *South American Journal* is at 37, Walbrook, E.C.

SOUTHERN CALIFORNIA AS A HOME FOR CONSUMPTIVES.

To the Editor of THE LANCET.

SIR,—Some years ago, when wintering at Mentone, my attention was directed to an English institution there of a semi-charitable nature for the benefit of consumptives. The plan on which it was conducted was as follows: Patients were received for a weekly payment of, I think, £1 1*s.*; the balance necessary for the support of the institution was obtained by voluntary contributions from the charitable public.

I desire to draw attention to Southern California as a field for a charitable institution similar to the above. The advantages of this locality, as compared with the south of France, may briefly be stated as follows:—1. The climate is for consumptives the best in the world; it is not too hot in summer, and is not as cold or as wet as Mentone in winter. 2. Persons possessed of some capital can purchase a few acres of land, and make a living by fruit farming. 3. Persons without means will have a fair chance of getting some light employment which will enable them to support themselves. 4. Persons suffering from consumption should have some occupation to prevent them dwelling on their physical infirmity; the out-door occupation of cultivating, or superintending the cultivation of, a small tract of land is probably the best. Land can be purchased here in small or large tracts; and if a judicious purchase be made, it will be a profitable investment, apart from the consideration mentioned above. 5. Many persons in delicate health go to Mentone for one winter and experience some benefit; not being able, however, to leave their homes and business for a length of time, the improvement proves to be temporary only. Here permanent homes can be made, and a permanent cure be effected. There are thousands of persons in this country—your correspondent among the number—who came here in the incipient stage of consumption, and who are now perfectly strong and well. 6. If sufficient money can be raised to build and furnish a consumption hospital here, I am confident that it could be maintained at less cost than the hospital in Mentone. A building capable of accommodating 200 patients could be erected and furnished for about £10,000. A suitable site, either at Pasadma or San Gabriel, in Los Angeles County, would be donated by a British subject resident here.

It may be objected that the distance from England to California is too great. In reply to this possible objection I have only to say that anyone whose lungs are seriously attacked must make up his mind to winter out of England for four or five years. From London to Los Angeles *viâ* Panama will not cost more than two round trips from London to Mentone. I beg to urge charitable people in London to form a provisional committee, and, if satisfied of the feasibility and advisability of the plan I have suggested, to solicit subscriptions in aid of the undertaking. A considerable amount would, I am sure, be subscribed here. Subscriptions would also be readily obtained in Canada; as many Canadians are annually driven here by the severity of the Canadian climate. I will be happy to furnish any and all information and assistance in my power, as also will the Rev. A. G. L. Trew (formerly of St. James's Cathedral, Toronto, Canada), rector of San Gabriel, Los Angeles County.

I am, Sir, yours truly,

C. WHITE MORTIMER,
Los Angeles, California, Jan. 1st, 1885. British Vice-Consul.

Mr. S. S. Noakes.—Amidon's Student's Manual of Electro-Therapeutics (G. P. Putnam's Sons, 25, Henrietta-street, Covent-garden, London).

BLEACHING OF THE HAIR.

To the Editor of THE LANCET.

SIR,—In Quain's Dictionary, page 576, it is stated by the late Sir Erasmus Wilson that hair may turn white in a few hours from mental disturbance, and that this is caused by the rapid development of gaseous fluid within the substance of the hair, obscuring the pigmentary granules. I should much like to know if any of your readers have ever seen or known of a well-authenticated case, and, if so, was the bleaching permanent, or did the gaseous cloud gradually roll away and allow the natural colour to reappear? It seems impossible that hair, perhaps many inches long, could be altered by any change that takes place in the body; not even death itself affects it.—I am, Sir, yours truly,

Gillingham, Dorset, Feb. 2nd, 1885. T. WOODS.

Mr. L. Macdona.—We should advise our correspondent to put his questions and his views before the Secretary of the Edinburgh Medical Missionary Society. Druitt's is a very good book; so are Bryant's Surgery, Roberts on Medicine, and Bristowe's book.

Mr. W. A. Ellis.—We may safely leave S. W——'s nonsense to the care of C. R. G—— and other local champions of vaccination.

E. J. L.—The cases described by our correspondent are such as bring the coroner's office into contempt.

MEDICAL ETIQUETTE AT THE EAST-END.

To the Editor of THE LANCET.

SIR,—About a fortnight ago I was called at 3 A.M. to attend a lady patient living close to my house. The child having been born suddenly, the husband naturally ran for the nearest medical man, as the practitioner engaged to attend lived at a considerable distance. I went at once, and attended to the patient and child. When leaving, the husband asked my fee; but I declined to accept any, stating that under the circumstances of the case I attended for the medical man engaged (who was a stranger to me), from whom I expected to hear as soon as he took charge of the case. Not having heard from, or received any acknowledgment for my services from, the said medical man, who has driven past my door on several occasions since then, I would feel obliged if you would kindly let me know through the medium of your columns, should such a case occur again, whether I would be justified in accepting a fee for my attendance, or refusing to attend for the same practitioner.

I am, Sir, yours truly,

Jan. 27th, 1885. A SUBSCRIBER.

*** Our correspondent acted most properly, and on none but the very highest principles can he be expected to act so again for the practitioner in question.—ED. L.

Dr. Thompson (Rome).—We hope to be able to find room for the paper in an early number.

A. B.—The method is undignified.

TINCTURE OF ACONITUM FEROX.

To the Editor of THE LANCET.

SIR,—In reference to Dr. Cullimore's letter on the above in your last issue (page 235), I shall be glad if you will allow me to make a correction as to its strength. I prepared it 1 in 8 of rectified (not proof) spirit, the same strength as the B.P. tincture of aconitum napellus, so as to have its action compared with the latter.—Yours obediently,

New Cavendish-street, W., Feb. 3rd, 1885. WM. MARTINDALE.

ERRATUM.—In line 9 of the report of cases under Dr. Elder's care at the Women's Hospital, Nottingham, page 202, for "two months later" read *twelve* months later.

COMMUNICATIONS, LETTERS, &c., have been received from—Dr. Dyce Duckworth, London; Dr. Harkin, Belfast; Dr. Sieveking, London; Mr. Blore, Leeds; Dr. Cullimore; Dr. H. G. Sutton, Sittingbourne; Dr. J. N. Bloom, Vienna; Mr. Minns, Thetford; Mr. W. C. Lucas Dromahair; Mr. J. J. Fox, Strathpeffer; Dr. J. H. Thompson, Rome; Mr. A. B. Marshall; Mr. Humphreys, Llanfair; Mr. Berry, Wigan; Mr. Vacher, Birkenhead; Mr. Vance, Aston; Mr. Abbott, Exeter; Mr. Alfred Wright, Romford; Dr. L. W. Marshall, Nottingham; Mr. Taafe, Brighton; Dr. Cafferata, Louvain; Dr. Bonavia, Etawah; Mr. G. Abbott, Tunbridge Wells; Dr. Wahltuch, Manchester; Dr. Althaus, London; Dr. Freyer, Mussoorie; Mr. Edgar Flinn; Dr. V. Sandford, Hereford; Dr. Rummo, Naples; Mrs. Pratt, Cardiff; Mr. English, London; Messrs. Wilson and Co., London; Mr. Birchall, Liverpool; Mr. W. W. Jones; Dr. Shipsley, California; Messrs. Street and Co., London; Dr. Elder, Nottingham; Mr. Rodman, Glasgow; Mr. Peet, London; Dr. Jay; Messrs. Woolley and Co., Manchester; Mr. Reeder, Liverpool; Messrs. Brown, Gould, and Co., London; Messrs. Savory and Moore, London; Messrs. Heal and Son, London; Mr. Lever, Stratford-upon-Avon; Mr. Hartley, Worcester; Mr. Havens, Eastbourne; Mr. Fuge, Taunton; Messrs. Wright and Co., Birmingham; Dr. Brown, Wansford; Mr. Sell, London; Mr. Whitty; Mr. Rowland; Messrs. Lloyd, Bullock, and Co., London; Messrs. Brainsby and Son, Peterborough; Mr. Shapcote, Devonport; Messrs. Funk and Co., New York; Mrs. Bourchier, Sheffield; Dr. C. Bell Taylor, Nottingham; Mr. J. P. Glover, Quarndon; Mr. Mallins, Watton; Mr. W. A. Ellis, London; Dr. Monteath, New Abbey; Mr. R. W. Parker, London; Mr. J. S. Wood, London; Dr. Hamilton; Mr. Banham, Sheffield; Mr. Mayo Robson, Leeds; Dr. Grailly Hewitt, London; Mr. Spreull, Dundee; Surgeon-Major K. McLeod, London; Dr. R. Crocker, London; Mr. C. E. Jennings, London; Dr. Suckling, Birmingham; Mr. Reginald Harrison, Liverpool; Mr. Alfred Wright, Romford; Mr. A. T. Norton, London; Mr. S. Snell, Sheffield; Mr. Martindale, London; Mr. Jessett, London; Mr. Blackett, London; Messrs. Kegan Paul and Co., London; Mr. Kolckmann, London; Mr. Shore; Mr. E. Jones, Limehouse; Mr. H. Kimpton, London; Mrs. Rahn, Ipswich; Mr. Barrow, Nottingham; Mr. Niven, Portsmouth; Mr. Perrygree; Mrs. Carless, Liverpool; Dr. Althorn, Uttoxeter; Messrs. Davis and Co., Newcastle-on-Tyne; Dr. Langley, London; Messrs. W. and A. K. Johnstone, Edinburgh; Mr. Armstrong, Manchester; Dr. Robert Bell, Glasgow; Mr. Sawtell, Stroud-green; Dr. Ainslie Hollis, Brighton; J. R. L.; T. E. B.; M.D., S.E.; Tyro, Turnham-green; A. B.; Medicus, Preston; M.D.

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Midland Evening News, Trowbridge Chronicle, Dumfries and Galloway Saturday Standard, Demerara Daily Chronicle, Yorkshire Post, Naval and Military Gazette, Leighton Buzzard Observer, Dramatic Review, The Voice, Liverpool Daily Post, &c., have been received.

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